

**BOSTON
STATE
COLLEGE**



1970-1971 CATALOG

THE COMMONWEALTH OF MASSACHUSETTS



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Boston State College

Catalog 1970-1971

625 HUNTINGTON AVENUE
BOSTON, MASSACHUSETTS 02115

Member of

The New England Association of
Colleges and Secondary Schools



The Boston State College Calendar, 1970-1971

SEPTEMBER						
S	M	T	W	T	F	S
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1970

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1971

FEBRUARY						
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




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29	30	31				

 — Registration periods
  — Holidays
  — Examination periods
 — Classes begin
  — Vacations

Calendar

September 8–11, 1970

Finals for Summer Trimester

FIRST (FALL) SEMESTER

September 17-22

Registration Period

September 24

Classes Begin

October 12

Columbus Day, Holiday

November 5

Mid-Term

November 11

Veteran's Day, Holiday

November 26 & 27

Thanksgiving Recess

December 23–January 3, 1971

Christmas Recess

January 8

Last Day of Classes

January 11–19

Examination Period

SECOND (SPRING) SEMESTER

January 21-26

Registration Period

January 28

Classes Begin

February 15

Washington's Birthday, Holiday

March 16

Mid-Term

March 17

Evacuation Day, Holiday

March 27–April 4

Spring Recess

April 9

Good Friday, Holiday

April 19

Patriot's Day

May 14

Last Day of Classes

May 17–25

Examination Period

June 4

Commencement

ELEMENTARY EDUCATION STUDENT TEACHING DATES

September 21–November 13	First Quarter
November 16–January 15, 1971	Second Quarter
January 25–March 19	Third Quarter
March 22–May 28	Fourth Quarter

SECONDARY EDUCATION STUDENT TEACHING DATES

September 21–November 13	First Quarter
November 16–January 15, 1971	Second Quarter
January 25–March 26	Third Quarter
March 29–May 28	Fourth Quarter

SUMMER TERM (I)

June 1	Classes Begin
June 17	Bunker Hill Day, Holiday
July 5	Independence Day, Holiday
July 9	Classes End

SUMMER TERM (II)

July 19	Classes Begin
August 27	Classes End

Boston State College

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Board of Trustees

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Division of State Colleges

Dr. Lawrence E. Dennis, *Provost*

General Information

In September, 1970, the institution known as Boston State College will begin its 119th year of education for service. Under the direction of the Board of Trustees of the Massachusetts State colleges, the college operates as a commuter institution, offering programs in the liberal arts and in teacher education.

A History of the College

In 1851, Nathan Bishop, first superintendent of Boston schools, recommended the establishment of a normal school. A year later the Boston City Council passed an act establishing the Boston Normal School as a pretext to obtain some education for young women beyond training in grammar grades. At that time there was only one other city normal school and only seven other public institutions of that nature in the United States, three of which were in Massachusetts.

In the same year (1852), 86 girls stepped out of their grammar school classes to embark on a "glorious new profession of teaching" in the Adams School House on Mason Street.

Two years later there was a strong demand for a public high school for girls, and, although the request was refused in that form, a number of high school studies were added to the Normal School work, and the course was lengthened from two to three years. The title of the Girls' High and Normal School was then adopted.

Near the close of the Civil War the work had grown to such an extent that a training department was organized in 1864 for practice teaching and for the observation of school work. Some six years later the number of students had increased to such a degree, about 350 were enrolled, that it was deemed advisable to move to the new building which had been built on West Newton Street.

Existence of the Normal School as a separate institution dated from 1872 when the School Committee decided the Normal and high school should thereafter be kept apart, thus returning the "normal school to its original condition as a separate school."

About this time a fourth year of work was added to the course of study in the Girls' High School. It was required that each applicant for admission to the Normal School should complete the four years of high school preparation before being accepted. By this means the Boston Normal School was given the distinction of being the first normal school in the country to demand four years of high school work as an admission requirement.

The first president was Loring Lothrop. Twenty years later Dr. Larkin Dunton was named as first headmaster of the Normal School in its independent existence. Upon his death in 1899, after 27 years of leadership, he was succeeded by Wallace C. Boyden who had acted as assistant for many years to Dr. Dunton.

In 1888 the Normal School course was extended from its original length of one year to 1½ years, and in 1899 kindergarten training was added as a supplementary course. Kindergarten training was in its infancy then, and the Boston Normal School was the first public institution to give training in that line.

In 1892, the time required for matriculation was increased to two full years, and in 1913 it was lengthened to three years with greater attention given to kindergarten work. During the same year the University Extension Commission, after careful inspection, certified credit toward the degree of Associate in Arts in seven courses out of the 17 offered.

In 1922, with the addition of two four-year courses, an opportunity was given to students to qualify for the degrees of Bachelor of Education and Bachelor of Science in Education.

Then in 1924 the school's name was changed to the Teachers' College of the City of Boston. The following year the college was granted the right to award a Master of Education degree.

The depression of the 1930's saw a clamor to abolish the school. This was defeated. In 1942 the college was accredited by the American Association of Colleges for Teacher Education after a 20-year wait, under the leadership of Dr. William H.J. Kennedy, president of the college from 1929 to 1948.

In 1948 men were admitted to the four-year course in Elementary Education following a 41-year wait, since men had been admitted to the Normal School in 1904. It was also during this year (1948) that Dr. William F. Looney took over the helm as the college's fifth president.

Probably the most significant event in the history of the college occurred in 1952 when, by a joint act of the Boston School Committee and the Massachusetts General Court, the Teachers' College became a state college under the Massachusetts Department of Education. It was now called the State Teachers College at Boston. As a state institution it started a period of steady growth and expanded offerings.

In 1960 the Massachusetts legislature passed an act eliminating the word "teachers" from the name of the state supported college. The State Teachers College at Boston thus became State College at Boston with the power to grant Bachelor of Arts and Bachelor of Science degrees in non-education courses.

Expansion of the college has been rapid during the past 60 years. In 1907 the school moved to its present Huntington Avenue campus. In 1964, the new William H. J. Kennedy Building was opened providing classrooms, modern laboratories, lecture halls, a new cafeteria and student lounge, and offices of the deans and Student Government Association.

Three years later the college added to its ever-growing complex a new building with gymnasium and classroom facilities.

The Evening Undergraduate College commenced in September, 1965, under the guidance of Dr. Looney and Dean Gerard M. O'Meara.

Dr. John J. O'Neill succeeded Dr. Looney as the college's sixth president on September 1, 1968, the same year the college came to be known as Boston State College.

Purpose

The motto of the College is "Education for Service." In both its liberal arts and teacher training programs the college aims at the fullest possible development of the individual through general education, professional training and specialization and participation in college activities. The graduate should be prepared for full and effective participation in the life of the community, state, and nation. To fulfill

this purpose, the college aims to provide educational opportunities for as many qualified students as its facilities and resources will allow.

Accreditation and Affiliation

Boston State College is accredited by the New England Association of Colleges and Secondary Schools.

The New England Association of Colleges and Secondary Schools accredits schools and colleges in the six New England states. Membership in one of the six regional accrediting associations in the United States indicates that the school or college has been carefully evaluated and found to meet standards agreed upon by qualified educators. Colleges support the efforts of public school and community officials to have their secondary school meet the standards of membership.

It also holds institutional membership in the following organizations:
American Association of Colleges for Teacher Education
Eastern States Association of Professional Schools for Education
New England Teacher Preparation Association
Association of State Colleges and Universities
American Association of Colleges

Admission

How and when to make application:

Applications for admission to all Undergraduate programs may be obtained by writing to the Admissions office.

Admissions for Graduate Programs are handled by the office of Dean of Graduate Studies. Both offices are located in the Administration Building. Applications will be available after October 1, 1970.

Entrance Requirements

Each applicant must be a high school graduate with at least 16 units of work or equivalent preparation. The Equivalency Certificate issued by the Massachusetts State Department of Education is acceptable in lieu of a high school diploma.

The applicant must also successfully complete the Scholastic Aptitude Tests and three achievement tests administered by the College Entrance Examination Board. One Achievement test must be English; the other two may be of the candidates own choosing.

Good health as evidenced by a physical examination report.

A personal interview may be required at the discretion of the Admissions office.

Secondary school transcripts should be sent to the office of admissions following the end of the first marking period of the senior year.

Early Acceptance

An applicant may be accepted by the college after the first marking period of the senior year, if he has completed successfully the Scholastic Aptitude Test and the three achievement tests and has a 3.0 B average in the highest 16 units of high school work. Eight of these units must be as follows: English (including Grade 12) = 4 units; College preparatory Mathematics = 2 units; American History = 1 unit; Biology, Chemistry or Physics = 1 unit. Students wishing to obtain a Bachelor of Arts Degree must also present 2 units in a foreign language.

Regular Acceptance

A student not eligible for early acceptance may qualify for regular acceptance if he meets the general requirements and has the following high school units: English (including Grade 1) = 4 units; Mathematics = 2 units; American History = 1 unit; Science = 1 unit. Applicants for the Bachelor of Arts Program must also present 2 units in a foreign language.

Advanced Placement

Applicants for admission to advanced standing, seeking transfer credits from other colleges and universities must meet the general admission requirements and must submit official transcripts, and letters of recommendation from the deans of all post-secondary institutions attended.

The Committee on Admissions will consider on an individual basis the status of applicants submitting scores for the Advanced Placement Tests of the College Entrance Examination Board.

Tuition and Fees

Registration Fee: Each entering student must pay a registration fee of \$20.00 following notification of acceptance. This fee is non-refundable, but is deducted from the first tuition payment of students who attend. A \$2.50 registration fee is required of each student attending classes in the Program of Continuing Studies.

TUITION

I. For Residents of Massachusetts:

- a. Full-time attendance—\$100.00 per semester payable at the beginning of the semester.
- b. Part-time day students—\$7.00 per semester hour.
- c. Program of Continuing Studies—\$18.00 per semester hour.
- d. Auditor in Program of Continuing Studies—\$11.00 per semester hour.

II. For Non-Residents of Massachusetts:

- a. Full-time attendance—\$300.00 per semester payable at the beginning of the semester.
- b. Part-time day students—\$21.00 per semester hour.
- c. Program of Continuing Studies—\$25.00 per semester hour.
- d. Auditor in Program of Continuing Studies—\$11.00 per semester hour.

FEES

Student Activities Fee—\$12.50 per semester

Athletic Fee—\$12.50 per semester (Except evening students)

Library Fee—\$5.00 per semester

Late Registration Fee—\$5.00

Every undergraduate student (except in the Program of Continuing Studies) is required to pay these fees. None is refundable. Every student thus becomes a member of the Student Government Association with the privileges of participation in all its activities and programs.

Tuition Refund Schedule

Within the first two weeks from the beginning of the semester—100%.

During the next four weeks—80%.

After the sixth week—No refund.

NOTE: Registration fee (\$20) for incoming students is deducted before refunds are made.



Student Financial Aid

I. PROGRAMS ADMINISTERED BY THE COLLEGE

A. General

Boston State College administers three Federal programs of student financial assistance: National Defense Student Loans, College Work Study Employment, and Education Opportunity Grants. The intent of these programs is to make higher education available to students whose family and personal resources are inadequate to meet their total educational costs. Many students supplement their resources by accepting a combination of funds from these programs. No student should refrain from applying for admission or continuing his studies because of financial considerations without first consulting the Office of Financial Aid.

The amount of assistance awarded to a student is based on the availability of funds and the student's ability to meet our estimated educational and personal costs of \$1600 per year. Consideration is given to expected family contributions, students' summer earnings expectations, and other resources. Preference for available funds is given to undergraduate students with the greatest financial need and who apply on time.

B. Applying for Assistance

All applicants for financial aid are required to submit annually an aid application to the Office of Financial Aid and to file a Parents' or Student's Confidential Statement with the College Scholarship Service. Boston State College, Code 3086, should be designated as the recipient of your Confidential Statement. Only

students who are U.S. citizens or non-citizens who have permanent visas or who can meet other specific criteria regarding their residence or immigration status are eligible to receive assistance from these Federal programs.

All applications for the Summer and/or Fall and Spring trimesters should be made prior to April 1. Applications for the Spring trimester *only* should be submitted prior to November 15. Applications received after these dates will be reviewed only if funds remain available after other awards have been made. Additional information regarding application procedures and eligibility requirements may be obtained from the Office of Financial Aid, Kennedy Building, Boston State College, Boston, Mass. 02115.

C. National Defense Student Loans

Students who are carrying at least one-half the full-time course load and who meet other criteria may borrow from funds provided by the National Defense Education Act. An eligible undergraduate may borrow up to a maximum of \$1,000 per academic year to a total of \$5,000. Graduate students may borrow no more than \$2,500 per year to a total of \$10,000 during both their graduate and undergraduate years. Any amount borrowed depends on demonstrated financial need.

Repayment of the loan begins nine (9) months after the borrower ceases to be enrolled as a student and must be completed within ten (10) years thereafter. No interest on the loan may accrue prior to the repayment period. Interest thereafter is to be paid at the rate of three (3) percent per year. Repayment may be deferred up to three (3) years while a borrower is serving in the Armed Services, VISTA, or the Peace Corps.

If a borrower becomes a full-time teacher in a public or private non-profit school, the loan may be cancelled at the rate of ten (10) percent per year to a maximum of fifty (50) percent of the total loan debt. Full-time teachers of handicapped children or of children in elementary or secondary schools in designated hardship areas may cancel their total loan debt at the rate of fifteen (15) percent per year.

D. College Work-Study Employment

Through the College Work-Study Program needy students who are enrolled on a full-time basis have an opportunity to earn part of their college expenses. Students may be given part-time employment in the College or in non-profit, off-campus organizations. On-campus jobs include work in the library, academic departments, and in the student personnel offices. Off-campus jobs are assigned in agencies such as the YMCA or Boys' Club.

So that such employment does not interfere with a student's academic progress, work under this program is limited to fifteen (15) hours per week when classes are in session and forty (40) hours per week during vacations and holidays. In general the basic hourly rate is \$1.70 - \$2.50 per hour, depending on place, length, and type of employment.

E. Educational Opportunity Grants

Authorized under the Higher Education Act of 1965, the Educational Opportunity Grants Program is available to a limited number of undergraduate students with exceptional financial need. Once awarded to a student, a grant may be renewed for the duration of his undergraduate study, if he continues to qualify for assistance. A student may not, however, receive a grant for more than eight (8) trimesters.

Grants range from a minimum of \$200 to a maximum of \$1,000 per year. Grants must be matched by and can be no more than the assistance a student receives from one of the following sources: National Defense Loan, College Work-Study Employment, Institutional Student Employment, or a State or private scholarship.

II. PROGRAMS ADMINISTERED BY AGENCIES OUTSIDE THE COLLEGE

A. Massachusetts Board of Higher Education

The Board of Higher Education is authorized to grant scholarships to needy and academically worthy full-time students. Applicants must be U.S. citizens or permanent residents of the U.S. who are domiciled in Massachusetts. All applicants must be pursuing a program of higher education. The application deadline for incoming freshmen is December 15 and for upperclassmen, April 1.

1. *General Scholarships* — These scholarships are awarded to cover the cost of tuition and are renewable for no more than three years, provided the student's academic standing is satisfactory. All applicants are required to file a scholarship application and either a Parents' or a Student's Confidential Statement, designating the "State of Massachusetts" (Code Number 0558) as one of the agencies to receive a copy.
2. *Honor Scholarships* — The Board of Higher Education is authorized to grant four merit scholarships in each Massachusetts Senatorial District. Selection will be based on grades achieved in a competitive examination. Merit or Honor Scholarships may be applied toward tuition costs only, and are renewable for no more than three academic years, providing the recipient remains in good academic standing.
3. *Other Scholarships* — Other special scholarships awarded by the Board of Higher Education include the following: (a) Special Education Scholarships; (b) Nursing Scholarships; (c) Medical and Dental Scholarships; and (d) Scholarships for Children of Deceased Members of Fire and Police Departments.

Specific inquiries regarding the above Board of Higher Education Scholarships should be addressed to:

Board of Higher Education
Scholarship Office
182 Tremont Street
Boston, Mass. 02111
Tel: 727-5367

B. Massachusetts Higher Education Loan Plan (H.E.L.P.)

The education of young people from middle-or upper-income groups frequently places a financial burden on their families, particularly if there are a number of children who want to go to college. In many cases, the student cannot qualify for student employment or an N.D.E.A. loan. Even when commercial credit sources are available, repayment generally runs concurrently with the years the student attends college. To help these young people and their families, a Guaranteed Loan Program is now authorized.

The major objective of this program is to make loans available to any college student who wants to borrow. To qualify for this plan, applicants must be accepted at or enrolled at Boston State College. U.S. citizens or permanent residents of the U.S. may borrow up to \$1,500 per year for undergraduate study. There is an interest charge of eight (8) percent per year on the unpaid loan balance. Monthly repayment of the loan begins nine (9) to twelve (12) months after the borrower has terminated his studies.

Students who wish to apply for H.E.L.P. loans should go directly to their local banks to obtain the necessary application forms. Inquiries regarding this program should be addressed to:

Massachusetts Higher Education Assistance Corporation
511 Statler Building
Boston, Massachusetts 02116
Tel: 426-9434

C. Tuition Aid for Massachusetts Veterans

The Massachusetts Department of Education has been authorized to issue a Certificate of Exemption from payment of tuition to qualified veterans. This certificate entitles a veteran to free tuition during a given academic year. Certificates are issued for study at any state institution of higher education in the Commonwealth and to any veteran whose service was credited to the Commonwealth. Eligible veterans must have served more than 180 days on active duty in the U.S. Armed Forces after February 1, 1955. Certificates of exemption are renewable for no more than three years, provided the student's academic standing is satisfactory.

Eligible veterans should report with their discharge papers to the State Adjutant General's Office, Room 184, State House to initiate the application procedure. This should be done at least two weeks prior to registration.



General Regulations

REGISTRATION

1. *Curriculum Advisement.* On entrance into the College each student will be assigned an advisor. As soon as the student makes a firm choice of major, ordinarily not before the completion of his freshman year, he will be reassigned an advisor within his major department. Students must meet with their advisors before each registration.
2. *Registration Dates.* Students will be mailed registration material and their times to register approximately 10 days before the registration period listed in the catalog.
3. *Course Load.* A full-time student may carry no less than 12 nor more than 18 semester hours. The normal course load is approximately 15 semester hours. Individual variation from this load may be allowed only with the permission of the Dean of Students.
4. *Course Changes.* Students may withdraw from courses only during the first four weeks of the term in the office of the Registrar. Students who fail to withdraw formally will receive a grade of 0 in the course.

A student may not add a course to his program or change a section after the first two weeks of classes.

5. *Withdrawal from the College.* Students who find it necessary to withdraw from the College should do so only after consultation with their Deans.

Until a student withdraws officially, he is registered in all courses and will receive grades appropriate to his performance. Students who cease attending classes without officially withdrawing will receive a grade of 0.

6. *Transfer of Credits.* Students regularly enrolled who wish to secure credit for courses taken at other institutions or in other divisions of Boston State College must secure permission from their deans or advisors prior to enrolling for these courses.

ATTENDANCE

Upperclassmen are on a free attendance system but must be present for previously announced tests.

Freshmen are allowed a limited number of cuts and should consult the Student Handbook for more detailed information.

ACADEMIC STANDING

The following quality-point ratio system is used at Boston State College:

A-4, B-3, C-2, D-1, F-0, P-Passed (in Pass/Fail courses)

A student must maintain a quality-point ratio of 1.5 at the end of the freshman year, 1.75 at the end of the sophomore year, 2.0 at the end of the junior year, and the student must have a final ratio of 2.0 in order to graduate. A student must withdraw from the college at the end of the first semester of the freshman year if his ratio is below 1.0.

“Inc” (incomplete) grades may be given only when the *Final Examination* has been missed. All other course requirements must be completed prior to the final examination.

“WP” (withdrawn passing); “WF” (withdrawn failing). These grades are reserved for those students who withdraw after mid-term with the written approval of the Dean of Students. WP indicates that the student was performing at a satisfactory level when withdrawn. WF indicates that the student was performing at an unsatisfactory level at the time of withdrawal. Neither grade is computed in the student’s grade point average.

“F” grades can never be removed, but the subjects in which they have been received must be repeated and passed, or, in the case of electives, other approved courses must be taken and passed either in approved summer sessions, or when possible, during the regular college year. Continuing subjects in which “F” grades have been received must be successfully repeated before the student may take advanced work.

TRANSCRIPTS

Official transcripts are the only type available. Upon graduation one copy will be sent to each student without charge. Additional copies may be obtained upon request at the rate of \$1.00 per copy. Ordinarily, transcript requests take a week to 10 days. During peak periods, at least a two-week delay must be anticipated.

Transcripts may be requested in person in Room 111A or through the mail only and must be prepaid. No telephone requests will be honored.

Library Facilities

The main collections of the College Library are located in a wing of the Administration Building. In addition an extensive general collection is being added to the new Fenway Building which opens in September, 1970.

The reference section of the library offers a wide selection of standard reference works as well as a large collection of pamphlet materials arranged by subject to aid the student and faculty member in



his research. The main section contains encyclopedias, dictionaries, directories, biographical sources and bibliographies on the humanities, sciences, education and the social sciences. While geared to all these

areas, the pamphlet collection places special emphasis on educational materials, including publications of the National Education Association and yearbooks from the various educational societies. In addition, there is a large section devoted to college catalogs from numerous graduate and undergraduate institutions throughout the country.

The Periodicals Section, recently greatly enlarged, provides outstanding coverage of current scholarly journals and professional periodicals, as well as extensive backfiles on microfilm. The comprehensive ERIC collection (microfiche) on developments in Education is an example of the expanding facilities made possible today by microforms. Microfilm, microfiche readers, and reader-printers are available for use.

The Curriculum Resource Center in Room 202A seeks to meet the teaching needs of student teachers and other education students preparing to teach in grades K-12. The center contains perhaps the finest complete collection in New England of teaching textbooks and curriculum guides in major subject areas.

In addition there is a large collection of juvenile fiction and a complete collection of the prize-winning Newbery and Caldecott Medal books.

All of the standard juvenile reference materials are available as well as educational materials, catalogs, and monographs of national and regional educational research programs in progress.

With an equal emphasis given to non-print teaching materials, our growing collection also contains some of the following: flat pictures, recordings, slides, tapes, transparencies, simulation games, film strips, films, film loops, paintings, art objects, and music scores.

Student Services

Orientation: An orientation program under the supervision of the Dean of Students is provided for new students at the beginning of each term. It includes testing, health examinations, introduction of student and administration officers, and exploration of college services, curricula, and activities.

Counseling: The office of the Dean of Students offers educational and personal counseling services.

Reading and Study Skills: Non-credit courses are offered which are designed to equip the student with the means of completing college-level reading and study tasks more quickly and effectively; increasing speed of comprehension, developing organizational skills, improving recall skills, notetaking from lecture and written materials, and study habits. Interested students may obtain further information from Dr. Leo. F. Hanley, 202 K.

Health: The day health office is located in the new gym building, Room 305G. An evening nurse is on duty in Room 201A.

Campus

Boston State College is located on Huntington Avenue between Longwood Avenue and Evans Way in Boston's educational and cultural center. In the immediate vicinity are Simmons and Emmanuel Colleges, the Harvard Medical and Dental Schools, Wentworth Institute, Northeastern University, and the Massachusetts College of Art. The Boston Museum of Fine Arts and the Isabella Stewart Gardner Museum offer unusual cultural advantages both in their collections and through their fine concerts and lectures.

ADMINISTRATION BUILDING

The Administration Building contains the office of the President and those of other administrative departments. The college library is also located here, as are the facilities of the Department of Foreign Languages, which includes a modern language laboratory.

COLLINS BUILDING

Here are the offices and classrooms of the Departments of Mathematics and Art.

FENWAY BUILDING

This, the newest of the college's facilities, is located on Ipswich Street, a short walk from the main campus. Departments located there are Anthropology, Economics, English, History, Political Science, Psychology and Sociology.

WILLIAM H. J. KENNEDY BUILDING

The Kennedy Building offers modern facilities for the teaching of a wide range of course offerings in Biology, Chemistry, Geography, Earth Science, and Physics. The lower floors contain the cafeteria, lounges for student and faculty, offices for student organizations, and the offices of the various deans.

NORTH BUILDING

This building houses the departments of Elementary Education, Secondary Education, Philosophy and Music.

PHYSICAL EDUCATION BUILDINGS

A recently renovated gymnasium building contains physical education and locker facilities for both men and women. The new Physical Education building contains offices and classrooms, a large gymnasium seating over 1000, as well as a variety of other facilities, including squash courts, dance studios, apparatus rooms, and a rifle range.

Organization and Activities

THE STUDENT GOVERNMENT ASSOCIATION

The Student Government Association is the legislative body for the consideration of problems and policies which affect the student body. This Association exists as the hub of all student activities. It informs the administration and makes recommendations concerning important matters in student and college life. The elected officers of the Student Government represent each student of the college and support the ideals that intensify the purposes of the college. Acting as official voice of the student body, the officers act as liaison between the student body and the administration.

Each student, on payment of this Student Activities Fee, becomes a member of the Student Government Association. Representatives and officers of the S.G.A. are elected by the undergraduate student body, and each student as a member of the association, is eligible to compete in elections, provided he fulfills the necessary academic requirements.

ATHLETICS

The Athletic program is based on the premise that athletics in the total educational process is of tremendous value both to the individual and his college.

At present Boston State is a member of the National Collegiate Athletic Association, the Eastern Collegiate Athletic Conference, and the New England State College Athletic Conference. Teams are sponsored in the following sports: Cross Country, Hockey, Basketball, Wrestling, Baseball, Rifle, Pistol, Gymnastics, Indoor and Outdoor Track, Lacrosse, Sailing and Golf. An active intramural program is operated throughout the school year. Intramural activities include: touch football, basketball, badminton, volleyball, boxing, golf and tennis. The coaching staff is composed of men nationally recognized as experts in their fields.

WOMEN'S RECREATION ASSOCIATION

The primary concern of the Women's Recreation Association is to provide activities and opportunities for students to develop or improve themselves physically, mentally, socially and emotionally. The main goal of the W.R.A. is to help produce well-rounded leaders of tomorrow.

The student officers and activity leaders work closely with the members of the Women's Physical Education Department in planning and organizing co-ed events, competitive sports for women, intramurals and special activity clubs.

Varsity teams are sponsored in the following sports: Basketball, Softball, Volleyball, Co-Ed Volleyball, Tennis and Cheerleading.

In addition, the W.R.A. sponsors the following clubs: Golf, Gymnastics, Folk and Square Dance, Modern Dance, Synchronized Swimming, Lacrosse, Judo, Riflery and Squash. Special activities include a Cook-Out, a Splash Party, Student-Faculty competitive event, and the Annual Banquet.

VOLUNTEER SERVICE

The Volunteer Service Bureau operates on the principle of service for others, aiding local agencies through recreation leadership, group work, guidance and social services. Members offer unpaid service to agencies throughout Metropolitan Boston.

PUBLICATIONS

Chalkdust, the college newspaper, is published weekly throughout the school year. Staff work is open to all students interested in gaining competence in writing and experience in newspaper work.

Spectrum, the college literary magazine, is published irregularly during the year. It offers opportunity for those interested in creative writing and photography. Any member of the student body is eligible to contribute.

Lampas, the yearbook, is edited each year by members of the senior class.

DRAMATICS

Each year, several opportunities for participation in dramatics occur, in the presentations of the Drama Club, in the college musical, and in a one-act play contest. Participation is open to any interested student.

CLUBS

A number of clubs and societies are maintained by the students to provide opportunities for activities of interest. These include religious clubs, language clubs, drama clubs, political clubs, social science clubs, sports clubs, a world travel club, and science clubs among many others.

HONOR SOCIETIES

Chapters of four national honor societies are presently operating on the campus: the Mu Iota Chapter of Phi Alpha Theta, the international honor society in History; Iota Rho Chapter of Gamma Theta Upsilon, the professional Geography fraternity, a chapter of Psi Chi, the national honor society in Psychology and Sigma Pi Sigma, the international honor society in Physics.

Undergraduate Curricula

Boston State College offers undergraduate programs leading to the Bachelor of Arts, Bachelor of Science and Bachelor of Science in Education. Candidates for these degrees shall satisfy the general education requirements of the college.

Candidates for the degrees of Bachelor of Arts and Bachelor of Science must develop major and minor concentration. In addition, those who seek the Bachelor of Arts degree must satisfy the foreign language requirement.

The Bachelor of Science in Education degree is offered in two fields, kindergarten-primary and elementary education. Candidates for this degree shall major in one of these fields and shall complete the requirement in student teaching.

General Education Requirement

Boston State College has long believed in a general education curriculum uniting the biological sciences and physical sciences, mathematics, the social sciences, and the humanities. The curriculum reflects this philosophy.

For graduation all students should demonstrate competence in the following: Physical Education, English Composition, Humanities, Social Sciences, Natural Sciences, and Mathematics.

The college has made provision for students of outstanding ability to forego those courses in which they are able to display a high level of knowledge. If a student is able to demonstrate his proficiency in any Group I course by his performance in an Advanced Placement Test or by some other criterion satisfactory to the department, he may select another course in the appropriate discipline with the advice and consent of the department chairman.

Required of All Students

		6 SHC
Physical Education	4 Semester Courses	o SH
English Composition	E101-102	6 SH
Effective Speech	E103	o SH

The English Composition requirement may be satisfied by the achievement of a score of 5, 4, or 3 in the Advanced Placement Test of the CEEB. If a student attains an A in E101, then he may begin his Literature sequence in the second semester. Students may satisfy the speech requirement by successfully passing, during the sophomore year, the proficiency examination given by the Speech Department.

Humanities

This requirement is to be satisfied by completing eighteen semester hour credits, six of which must be met by choosing at least one two course sequence from Group I and six by choosing at least two courses from at least two of the disciplines from Group III.

Group I

Major British Writers	E201-202	6 SH
American Writers	E205-206	6 SH
Masterpieces of World Literature	E203-204	6 SH
Survey of Spanish Literature	Sp211-212	6 SH
Survey of French Literature	Fr211-212	6 SH
Survey of German Literature	Gr211-212	6 SH

*Group II **

Plays of Shakespeare	E301 or E302	3 SH
Romantic Poetry	E303	3 SH
Modern Drama	E307	3 SH
Advanced Writing	E322	3 SH
Victorian Poetry	E404	3 SH
Modern Novel	E406	3 SH

Group III

Basic Studies in Music	Ms205	3 SH
Structure in the Visual Arts	A202	3 SH
Art Appreciation	A201	3 SH
Appreciation of Music	Ms201	3 SH
Problems of Philosophy	Ph101	3 SH
Ethics	Ph301	3 SH
Philosophy of Man	Ph102	3 SH
Introduction to Oriental Art	A305	3 SH
Logic	Ph203	3 SH

*Students should consider the value of having had some training in a Group I course before electing courses from Group II.

Social Sciences

This requirement is to be satisfied by completing fifteen semester hour credits, six of which must be met by choosing one two course sequence from Group I. Of the remaining nine hours at least one course must be selected from Group II and at least one from Group III.

Group I

Western Civilization	H101-102	6 SH
Ideas of Western Man	H103-104	6 SH
World History	H105-106	6 SH

Group II

*American Government	Gv101	3 SH
Comparative Government	Gv102	3 SH
Principles of Economics	Ec101	3 SH
Human Geography	G302	3 SH
*American History to 1870	H201	3 SH
American History since 1870	H202	3 SH
Urban Geography	G403	3 SH

Group III

Introduction to Psychology	Py101	3 SH
Introduction to Anthropology	An301	3 SH
Sociology	So201	3 SH

*Massachusetts State Law requires that a student take a three semester hour course emphasizing the United States and Massachusetts Constitutions. This requirement is met by taking either H201 or Gv101.

Natural Sciences and Mathematics

This requirement is to be satisfied by taking a total of five courses. At least one two course sequence must be selected from Group I and at least one course from Group III.

Group I

**Chemistry	Ch101-102	8 SH
General Chemistry	Ch103-104	8 SH
Biology	Bi201-202	6 SH
Physics	P101-102	8 SH
Physics	P301-302	6 SH
Geology	G1101-102	8 SH

Group II

Physical Science	Ps101-102	6 SH
Oceanography	GI201	3 SH
Oceanography	GI202	3 SH
Physical Geography	G301	3 SH
Astronomy	P306	3 SH
Weather and Climate	G406	3 SH
**Structure of Number System	M224	3 SH
**Basic Modern Math	M305	3 SH

Group III

Fund. Principles of Math	M101	3 SH
Intro. to Modern Math	M103	3 SH
Calculus 1A	M107	4 SH
Mathematical Analysis I	M109	3 SH

**A student may not take both Ch101-102 and Ch103-104 nor Math 224 and Math 305 for credit.

Total number of general education semester hours credit 54-57 hours; 51-57 hours if second semester of English Composition is excused. It is recommended that all students substantially complete these requirements in their first four semesters.

I. REQUIREMENTS FOR THE DEGREE OF BACHELOR OF
ARTS OR BACHELOR OF SCIENCE

Major and Minor Concentrations

The requirement for the A.B. or B.S. major concentration shall consist of thirty to thirty-six hours to be determined by the department.* The minor concentration shall consist of eighteen to twenty-one hours to be

*Psychology excepted, where twenty-four hours shall constitute a major.

determined by the department offering the minor. All courses taken in a department shall count toward the major and minor concentrations; however, departments may specify a core of courses required for the major and minor. A minimum of 120 semester hour credits (exclusive of student teaching) shall be required for graduation.

Foreign Language Requirement

Candidates for the Degree of Bachelor of Arts may satisfy the foreign language requirement by the successful completion of a course at the advanced level (131-132) or above, or by the successful completion of two years work in one language at college level. This requirement may also be met by a superior performance on the achievement test of the CEEB.

II. TEACHER PREPARATION-SECONDARY

Students who plan to teach in the secondary schools shall qualify for the degree of Bachelor of Arts or Bachelor of Science and shall minor in secondary education. The courses required for this minor are listed on page 73 . In addition they must student teach for a period of time not to exceed eight weeks, for which they will receive a maximum of six credits.

III. REQUIREMENTS FOR THE DEGREE OF BACHELOR OF SCIENCE IN EDUCATION

Candidates for the degree of Bachelor of Science in Education shall develop a major of thirty to thirty-six hours in Elementary or Kindergarten-Primary Education. The courses required for this major are listed on page 69 . Elective hours may be used by a student to develop a minor in some other field. In addition to the major, candidates shall teach for one semester for which they will receive twelve credits.

The graduation requirement for this degree shall be 126 semester hours credits.

MAJOR AND MINOR FIELDS

Candidates in secondary education or a non-teaching program may choose a major from the following fields:

Biology	History
Chemistry	Mathematics
Earth Science	Natural Science
English	Physical Education (Men, Women)
French	Physics
Geography	Political Science
German	Spanish

The following major fields are open only to those in the non-teaching preparation programs:

Economics	Philosophy
Metropolitan Studies	Psychology
Latin American Studies	Sociology
Law Enforcement	

A minor may be developed in any of the major fields and in any of the following:

Anthropology
Art
Music

HONORS PROGRAM

The Honors Program is open to Juniors and Seniors who maintain at least a 3.0 average. Further departmental requirements may be obtained from the following faculty advisors:

Art	Mr. Joseph Fiorello
Biology	Dr. Rita McCauley
English	Dr. Ann R. Howe
History	Mr. John Weston
Modern French Language	Dr. Anthony J. Simeone
Mathematics	Dr. Raoul Freyre
Music	Dr. Edward J. FitzPatrick
Philosophy	Mr. John O'Neill
Political Science	Dr. David L. Sudhalter
Psychology	Dr. Robert A. Goodale
Sciences	Mr. Henry Mariani

A bachelor's degree with honors indicates to an employer or to a graduate school the special abilities and the advanced qualifications of the student.

WHO'S WHO AMONG STUDENTS IN AMERICAN UNIVERSITIES AND COLLEGES

Boston State College is now recognized with 800 other colleges and universities in this national honor organization for outstanding students. College Sophomores and Juniors are eligible for nomination. The criteria for membership is based on the student's scholarship, leadership, and cooperation in educational and extracurricular activities. General citizenship and the student's promise of future usefulness are also considered. Nomination is on a student-faculty-administration basis.

Evening Undergraduate College

The Evening Undergraduate College offers to students an opportunity to pursue a program of study during the evening hours. Those students wishing to pursue a degree program in the Evening College may work toward a Bachelor of Science degree with a major in either English or History. These degrees will be non-teaching degrees.

Students may take a minimum of six semester hours of credit and a maximum of eighteen semester hours of credit each semester.

FACULTY

The Faculty of the Evening College is composed of the faculty of the Day College and selected visiting lecturers.

CLASS SESSIONS

From September to June classes are held Monday through Thursday evenings from 4:15 to 9:15.

ADMISSION PROCEDURES

1. Application filed with Boston State College.
2. Transcript of high school record.
3. The following tests given by the College Entrance Examination Board:
 - a. Scholastic Aptitude Test (both verbal and mathematical)
 - b. English Achievement Test (exclusive of writing sample)

c. Two other Achievement Tests of each candidate's own choosing.

4. A personal interview may be required at the discretion of the Admissions office.

TUITION

Tuition for the Evening College is the same as for the Day College. However, for those students not enrolled in a full time program, adjustments will be made in the tuition.

STUDENT ACTIVITY FEE

Each student is required to pay a Student Activities Fee of \$12.50 per semester. The development of a mature spirit of self-government is encouraged by the college.

Evening College students elect two representatives to the Student Government Association to represent them and to present their views to this body. Evening College students are encouraged to participate fully in Student Government Activities.

VETERANS NOTICE

Veterans enrolling in the Evening College under the new Educational Assistance must present their certificate of eligibility to the Dean at the time of registration or as soon as possible thereafter. Veterans are expected to follow the same procedure for payment of tuition as all other students.

FURTHER INFORMATION

For further information concerning the Evening Undergraduate College, contact Gerard M. O'Meara, Dean of the Evening College.

Graduate School

The Graduate School offers a full-time day program leading to the degree Master of Education. A student is normally expected to complete the program in one year. During this year, a graduate of an approved college or university may prepare for teaching in either elementary or secondary schools. Those who have previously completed a program of teacher preparation are not eligible for admission to the day Graduate School.

In the secondary program students must elect one of the following major fields:

Biology	Mathematics
English	Modern Languages
Geography	Political Science
History	Science

Appropriate undergraduate preparation is required in the student's major field.

Further information on the Graduate School may be obtained by contacting Dr. Francis P. O'Hara, Dean of Graduate Studies.

Elementary Curriculum

First Semester		Sem. Hrs.
Ed521	General Methods El. Ed.	3
Ed524	Reading and Language Arts Methods	3
Py522	Psychology for Teachers	3
Ed516	Teaching Modern Math and Science	3
Ph527	Philosophy of Educ. I	3
Ed527G	Geography for Elementary Teachers	2
		<hr/> 17

*Second Semester – Third Quarter**Sem. Hr.*

Ed522	Methods in Social Studies	2
Ed523	Educational Measurement	2
E521	Children's Literature	2
Ph528	Philosophy of Education II	2
Ed513	Art for Elem. Teachers	1
Ed515	Music for Elem. Teachers	1

*Second Semester – Fourth Quarter**Sem. Hr.*

*Ed500	Student Teaching and Seminar	6
		<hr/> 16

*Secondary Curriculum**First Semester**Sem. Hrs.*

Major Field		6
Major Methods		2
Ed533	Principles of Sec. Ed.	3
Py501	Psychology of Education for Secondary Teachers	3
Ph531	Philosophy of Ed. I	3
		<hr/> 17

<i>Second Semester – Third Quarter</i>		<i>Sem. Hrs.</i>
Major Field		2
Elective in Major Field		2
Seminar in Major Field		2
Ph532	Philosophy of Education II	2
Ed531	Tests & Measurements for Secondary Teachers	2
<i>Second Semester – Fourth Quarter</i>		<i>Sem. Hrs.</i>
*Ed500	Student Teaching and Seminar	6
		<hr/> 16

*Eight (8) weeks of Student-teaching. Those who have previously completed a program of teacher preparation are *not* eligible for admission to the Day Graduate Program. However, a full time Graduate schedule can be arranged in the Division of Continuing Studies for such candidates or for teachers on sabbatical leave.

Program of Continuing Studies

This program admits candidates for the degree of Master of Education and also candidates with advanced standing for the degree of Bachelor of Science in Education. Classes in the Program of Continuing Studies are held in the late afternoon and in the evening in the fall and winter semesters and in the morning during the summer.

MASTER OF EDUCATION

Regulations governing the program leading to the degree of Master of Education in the Division of Continuing Studies at Boston State College:

I. Requirements for admission to the Master of Education Program:

- a. An official application for admission must be submitted to the office of Continuing Studies.
- b. A Bachelor's degree from an accredited college.
- c. The committee of Admission to the Graduate program reserves the right to prescribe successful completion of further undergraduate study for those candidates whose Bachelor preparation is not adequate for a graduate program.

II. Requirements for matriculation in the Master of Education Program:

- a. After completion of nine approved semester hours, the student may, and after the completion of twelve semester hours, the student must, apply for matriculation to the Master of Education program.

- b. An official copy from the Educational Testing Service of the candidate's scores in the Aptitude Test of the Graduate Record Examination. The Graduate Record Examinations must be taken no later than the first semester of graduate study.
- c. An official transcript of record for all prior collegiate study.

III. Candidates must complete the following minimum requirements to be eligible for the degree:

- a. Research and Evaluation (must be taken during the first semester or session of Graduate Study).
- b. Advanced Philosophical Foundations of Education.
- c. Advanced Psychological Foundations of Education.
- d. A minimum of 15 semester hours in the area of Education is required.
- e. A concentration of at least 15 semester hours in one of the following areas is required:
 - 1. Elementary Education or Secondary Education
 - 2. Guidance.
 - 3. Administration or Supervision.
 - 4. An Academic Area.
 - 5. A Specialized Area as determined through consultation with the Dean of Graduate Studies.

IV. General Policies

- a. The quantitative requirements for the degree shall be a minimum of thirty-three (33) semester hours. Before being eligible to receive the degree, the student must pass a comprehensive examination. A candidate who fails the comprehensive examination may be given one further opportunity to take it.

- b. All the work for the degree must be completed within a period of six (6) years.
- c. Of the thirty-three (33) semester hours of credit required, twenty-seven (27) must be earned in graduate courses taken on the campus of Boston State College. Courses taken for graduate credit in any college other than Boston State College must be approved in advance. Course grades lower than "B" from other institutions are not transferable.
- d. Students will be marked on the basis of A, B, C, F, W, (Withdrawn), Inc. (Incomplete), or Aud. (Audit). Graduate students who accumulate more than six (6) semester hours of grade C or below, must withdraw from the program. Students may withdraw from a course without penalty and receive the grade W up to the mid-semester examination. Withdrawals are not permitted after the mid-semester examination, except for due cause. If for any reason a student must withdraw from class, a written notice and explanation must be filed immediately with the Office of Continuing Studies. Telephone calls are not accepted as notifications of withdrawals. If a student does not take the final examination or fails to submit a term paper the grade will be recorded as Inc. (incomplete). If the incomplete grade is not cleared in one semester, the course grade becomes F.
- e. For full-time teachers not more than six (6) semester hours of credit per semester may be credited toward the graduate degree.
- f. One semester hour of credit per week of summer session is considered to be a normal load.
- g. Successful practice teaching under college supervision or successful classroom teaching experience is required before the degree of Master of Education will be awarded.
- h. Students are allowed three absences during the semester. This regulation will be strictly enforced.
- i. Under no circumstances may courses or academic status (e.g. from credit to audit, etc.) be changed after the third meeting.
- j. Students in a formal program for the Master of Education degree at Boston State College must take their final semester's course work at Boston State College.

Those persons who qualify for student-teaching must make application for student-teaching in Room 109A prior to the listed dates of registration and pay the tuition at that time.

UNDERGRADUATES

In order to receive an undergraduate degree through the Program of Continuing Studies, the applicant must have a minimum of sixty (60) *Acceptable* transfer credits from an accredited college or university. Only officially sealed and signed transcripts will be evaluated by Boston State College.

Any transcript request for collegiate work completed in the Program of Continuing Studies will be honored only if a complete official record of all previous collegiate work from other colleges or divisions of this college is on file in the Program of Continuing Studies office.

For further information concerning the Program of Continuing Studies, contact.

Thomas F. Dungan
Director of Continuing Studies

Departments and Courses of Instruction

ART

Vincent J. Tringale, Chairman

The courses offered by the Department of Art are designed to develop perception, imagination, intelligence and creativity. In order to foster these abilities and to promote a general understanding of man's aesthetic nature, a program in both the theoretical and the practical aspects of art has been provided.

A minor in art may be acquired by students who will take courses totaling a minimum of 18 credit hours of art elective courses as designated by the Department of Art.

DESIGN

A101

Elective for Freshmen and Sophomores. Problems in space, line, form, color, and texture are considered and developed in various techniques including collage and lettering. Three hours a week. *Three semester hours.*

INTRODUCTION TO DRAWING AND PAINTING

A102

Prerequisite: A101. Figure drawing, perspective and water color are emphasized in separate units in one semester. The fostering and extension of previously developed techniques is emphasized. Three hours a week. *Three semester hours.*

INTRODUCTION TO GRAPHICS

A200

Prerequisite: A102. Open only to Juniors and Seniors. Originality and craftsmanship are encouraged in the student's preparation and repro-

duction of designs in monoprinting, silk screen, linoleum and wood cuts, lithographic crayon preparation, celluloid etching, and other techniques. Three hours a week. *Three semester hours.*

ART APPRECIATION

A201

This course introduces the student to an approach to the works of the artist and to important writings in aesthetics. Analysis of the visual language is developed through slide lectures, museum visits, and assigned reading. Emphasis is placed on the aesthetic appreciation of the various areas within the socio-historic context. Three hours a week. *Three semester hours.*

STRUCTURE IN THE VISUAL ARTS

A202

A lecture-laboratory approach to an appreciation of art through cognitive reasoning and visual discrimination. Through analysis of works of art, the student is expected to experience a greater insight into the creative process. As a follow-through of the above, the student will create his own interpretations in varied art media. Three hours a week. *Three semester hours.*

INTERMEDIATE DRAWING AND PAINTING (A)

A203

Prerequisite: A102. An objective approach to the recording of nature. Still life, portrait and landscape paintings are executed in opaque and transparent paints to develop the student powers of observation. Three hours a week. *Three semester hours.*

INTERMEDIATE DRAWING AND PAINTING (B)

A204

Prerequisite: A203. A course in painting experimentation and free interpretation of the object, stressing an individual search for form and color. An individual style and personal direction is expected to be developed by the student. Three hours a week. *Three semester hours.*

ADVANCED PAINTING (A)

A301

Prerequisite: A204. A course in which the personal and individual style of the student is used to solve problems of self-expression, augmented by the knowledge of design, using mixed media, collage and paint. Three hours a week. *Three semester hours.*

ADVANCED PAINTING (B)

A302

Prerequisite: A301. This course stresses the personal painting style of the student. Individual interpretation of subject matter will be discussed and examined through critique. Three hours a week. *Three semester hours.*

THE ARTS OF THE UNITED STATES

A303

Elective for Juniors and Seniors. The course will cover painting, sculpture and architecture in America from the time of the colonies to the present. "Revival Periods" and Contemporary styles will be discussed and analyzed. Three hours a week. *Three semester hours.*

MODERN AND CONTEMPORARY ART

A304

Elective for Juniors and Seniors. The course traces the development and influence of man's activities in Europe and the Americas in the twentieth century and its effect upon painting, sculpture, architecture, and the minor arts. Three hours a week. *Three semester hours.*

INTRODUCTION TO ORIENTAL ART

A305

The study in depth of classic periods of Indian, Chinese, and Japanese art with readings in literature and philosophy of religion as well as history, as requisite background for understanding the Eastern context. A seminar atmosphere will be emphasized as well as use of the Oriental Art collection of the Boston Museum of Fine Arts. Three hours a week. *Three semester hours.*

BASIC SCULPTURE

A306

Open only to Juniors and Seniors. Introduction to basic techniques of additive and subtractive sculpture. Relief as well as sculpture in the round projects will be executed. Plastic, clay, wood, wire and styrofoam are the materials to be explored. Casting in plaster will be emphasized. Three hours a week. *Three semester hours.*

ART FOR THE KINDERGARTEN-PRIMARY LEVEL

A315

Required of Juniors who have elected the Kindergarten-Primary curriculum. A study of the foundations and current objectives of art

educators and their application to the grade levels concerned within this course. Three hours a week. *Three semester hours.*

ARTS AND CRAFTS

A316

Required of Juniors who have elected the Kindergarten-Primary curriculum. A studio course designed to give a working knowledge of the basic techniques in two and three dimensional art deemed essential on the kindergarten-primary levels. Two hours a week. *One semester hour.*

ART FOR THE ELEMENTARY SCHOOL

A325

Required of Juniors who have selected the Elementary Curriculum. An introduction to various philosophies of art education, past and present. This course is designed to acquaint future teachers with the wide scope in the various areas of child growth and development as related in their art. Three hours a week. *Three semester hours.*

ARTS AND CRAFTS

A326

Required of Juniors who have elected the Elementary Curriculum. A workshop course designed to introduce the student to the wide variety of media and materials and in the use of these in two and three dimensional art projects. Two hours a week. *One semester hour.*

SEMINAR AND PAINTING

A401

Prerequisite:A302. An advanced painting course, conducted under seminar conditions for philosophical and visual inquiry into the personal style of each student through ideas and critique. Three hours a week. *Three semester hours.*

VISUAL AESTHETICS FOR THE CLASSROOM TEACHER

A402

Open only to Juniors and Seniors. A course specifically recommended for all students who plan to teach either the elementary or secondary level. Specific projects individually programmed to both areas in order to facilitate an awareness and understanding of the aesthetic environment for learning. Three hours a week. *Three semester hours.*

ART MEDIA, PROCESS AND PRACTICE

A403

Prerequisite: A101 and A102. Elective for Juniors and Seniors. In this course, opportunity is given to the student to become acquainted with media and to develop a better understanding of the objectives, principles and practices of art expression. Four hours a week. *Three semester hours.*

VOLUME DESIGN

A404

Elective for Juniors and Seniors. Prerequisite: A101 and A102. A course devoted to discovering the principles of form and space in architecture, sculpture and other three-dimensional arts. Students will work with a variety of sculptural materials including plaster, clay, wood, etc. Four hours a week. *Three semester hours.*

BIOLOGY

Dr. Rita McCauley, Chairman

The department offers both major and minor programs in biology. All Biology majors must complete Ch 101-102 and Ch 301. Two semesters of mathematics are required preferably M 109-110 or M 107-108. Two semesters of physics are recommended. While the introductory courses Bi 207-208 are set up for prospective biology majors, a student entering the program late may offer Bi 201-202 instead. All biology majors must complete Bi 207-208, Bi 301, Bi 306, Bi 401 and Bi 402. Unusual program situations may be adjusted with the consent of the chairman of the department.

All biology majors are required to register with the biology department so that advisors may be assigned.

A minor in biology may be developed from a combination of courses for which the student has the stated prerequisites.

FRESHMAN ORIENTATION SEMINAR

Bi101-102

Required of all future biology majors. Current developments in biology will be discussed. An opportunity will be given to become familiar with

the use of microscopes and other departmental equipment. One hour a week. No credit.

BIOLOGY I

BI201

The course introduces the student to the principles and problems basic to an understanding of life processes. Lectures and discussions are planned to broaden the concepts gained from laboratory work. Four hours a week. *Three semester hours.*

BIOLOGY II

BI202

Prerequisite: Bi 201. This is a continuation of Biology I emphasizing genetics, ecology and the diversity of life forms. Lectures and discussions are coordinated with laboratory work and readings. Four hours a week. *Three semester hours.*

BIOLOGY OF THE LOWER PLANTS

BI204

Prerequisites: Bi 201 or Bi 207. A consideration of the structure, functioning, and life cycles of significant representatives of the algae, fungi, lichen, liverworts, mosses, and ferns. Two lectures, two hours in laboratory a week. *Three semester hours.*

BIOLOGY OF THE HIGHER PLANTS

BI207

Required of biology majors in place of Bi 201. This course deals with the biology of the seed-bearing plants. Particular attention will be given to the chemical processes involved in photosynthesis, respiration, and nutrition. Lectures, demonstrations, laboratory work, and readings will be used. Three lectures, two hours in laboratory a week. *Four semester hours.*

INVERTEBRATE ZOOLOGY

BI208

Required of biology majors in place of Bi 202. The non-chordate animals will be studied with emphasis on the reactions of the living organism. Culturing methods and care will be included. Lectures, demonstrations, laboratory investigations, and readings will be used. Three lectures, two hours in laboratory a week. *Four semester hours.*

ANATOMY

BI211

Prerequisites: Bi 201-202. Required of Physical Education (Women). The study of body organization with stress on the muscular and skeletal systems. To be offered in Spring, 1972. One lecture, two two-hour laboratories a week. *Three semester hours.*

VERTEBRATE MORPHOGENESIS

BI301

Required. Prerequisites: Bi 201-202 or Bi 207-208. An integration of vertebrate comparative anatomy and embryology which considers mechanisms, interdependence, and the factors underlying structural transformations. Two lectures, six hours in laboratory a week. *Five semester hours.*

HISTOLOGY AND HISTOLOGICAL TECHNIQUES

BI303

Prerequisites: Bi 201-202 or Bi 207-208. A study of cells and tissues with attention given to their relation to the anatomy and physiology of the whole organism. Practice will be given in the preparation of tissues for microscopic study. Two lectures, four hours in laboratory a week. *Four semester hours.*

INTRODUCTION TO EXPERIMENTAL BIOLOGY

BI304

Prerequisites: Bi 201-202 or Bi 207-208, Bi 204, Ch 101-102. An introduction to the particular working of the scientific mind through participation both as an individual and as a team member in work on a series of limnological investigatory units. Six hours in laboratory a week. *Three semester hours.*

HISTORY OF BIOLOGY

BI305

A survey of the evolution of knowledge of the biotic world leading to a concept of the present state of biological science and the problems it faces. One lecture. *One semester hour.*

ECOLOGY I

BI306

Required. Prerequisites: Bi 201-202 or Bi 207-208. A study of the relationships of plants and animals to their environment. Behavior, structure, adaptation, and natural selection are the central themes. Three optional field trips. Three lectures. *Three semester hours.*

ECOLOGY II

BI307

Prerequisite: Bi 306. Continues and presupposes Bi 306 dealing primarily with the patterns and origins of plant and animal distribution of the earth. The role of natural selection as an adaptive agent is emphasized. Three lectures. *Three semester hours.*

MARINE BIOLOGY

BI308

Prerequisites: Bi 201-202 or Bi 207-208. Oceanography and Ecology are recommended. A study of the sea and organisms that live in it. Field trips and laboratory studies of marine plants, invertebrate and vertebrate animals found in the New England seas will be a major part of the work. Two lectures, four hours in laboratory a week. *Four semester hours.*

PHYSIOLOGY OF EXERCISE

BI311

Prerequisites: Bi 201-202, Bi 211. Required of Physical Education (Women). The study of the functions of the organ systems with special emphasis on the physiological effects of exercise. To be offered in Fall, 1972. Two lectures, one two-hour laboratory a week. *Three semester hours.*

CELLULAR BIOLOGY

BI401

Required. Prerequisites: Bi 201-202 or Bi 207-208; Ch 101-102, Ch 301. The components of cells, their nature, characterization and functional role. Two lectures, four hours in laboratory a week. *Four semester hours.*

GENETICS

BI402

Required. Prerequisites: Bi 201-202 or Bi 207-208. An introduction to the principles and physical basis of heredity. Laboratory experiences will include fundamental techniques used in modern genetic research. Two lectures, four hours in laboratory a week. *Four semester hours.*

MICROBIOLOGY

BI404

Prerequisites: Bi 201-202 or Bi 207-208, Ch 101-102. Fundamentals of structure, growth, and habitat of the major groups of microorganisms. Laboratory experiences will give training in the basic methods of

observation, propagation, and study of microorganisms. Two lectures, four hours in laboratory a week. *Four semester hours.*

SPECIAL PROBLEMS IN BIOLOGY

BI405

Open only to biology majors. Prerequisite: Bi 304. Investigations into an open ended biological problem chosen from the student's special interests and needs. Four hours in laboratory a week. *Two semester hours.*

ADVANCED MICROBIOLOGY

BI407

Prerequisite: Bi 404. A study of the isolation and identification of microbiotic forms. Principles in immunology and serology as related to parasitic form will be discussed. Two lectures, four hours in laboratory a week. *Four semester hours.*

COORDINATING SEMINAR IN BIOLOGY

BI408

Open only to senior biology majors. Reading, lectures, and discussions designed to unify and strengthen the background of students in modern biology. Two hours a week. *Two semester hours.*

PLANT PHYSIOLOGY

BI409

Prerequisite: Bi 401. The major physiological processes of plants. Two lectures, four hours in laboratory a week. *Four semester hours.*

VERTEBRATE PHYSIOLOGY

BI411

Prerequisites: Bi 301 and Bi 401. A study of the life processes of vertebrate animals, including circulation, respiration, excretion, digestion, reproduction, nervous system, special sense organs, and the endocrine system. Two lectures, three hours in laboratory a week. *Three semester hours.*

FIELD BIOLOGY

BI421

The course is designed to acquaint students with the plants and animals of New England and with problems of environmental conservation. Field trips. Three hours a week. *Three semester hours.*



SPECIAL PROBLEMS IN BIOLOGICAL RESEARCH BI505
Required of graduate students with the major field in Biology. By arrangement. *Four semester hours.*

SEMINAR IN BIOLOGY BI508
Required of graduate students with the major field in Biology. Four hours a week, third quarter. *Two semester hours.*

BIOLOGICAL SCIENCE FOR SECONDARY TEACHERS BI536
Elective for graduate students who are preparing to teach science on the secondary level. The rationale of the Biological Science Curriculum Study is the basis of the course. Attention is given to the development of demonstration and laboratory techniques. Four hours a week. One quarter. *Two semester hours.*

Chemistry

Dr. Francis McCarthy, Chairman

The department offers both major and minor programs in Chemistry. Programs are available for those preparing to teach Chemistry in High School, for those interested in Graduate study, and for those who seek to enter industry. A.B. and B.S. majors in Chemistry are required to take the following courses: Ch 101-102; Ch 201-202; Ch 203-204; Ch 303-304; Ch 306 and Ch 401. Candidates for the B.S. or A.B. in Chemistry with Secondary Education Minor are required to take Ch 101-102; Ch 201-202; Ch 203-204; Ch 303-304; and Ps 503. A minor in Chemistry requires the following courses; Ch 101-102; Ch 201; Ch 203; along with at least one of the following; Ch 202; Ch 204, or Ch 305.

A student, who is considering Graduate Study (M.S. or Ph.D. in Chemistry) or a career in industry can best prepare himself by including Chemistry 402, 403, and 490. These senior courses are in accordance with the guidelines set forth by the American Chemical Society.

STATEMENT OF PREREQUISITES

The prerequisites for each course are included in the description of the course. One or more prerequisite may be waived but only with the approval of the Curriculum Committee of the Chemistry Department.

PRINCIPLES OF CHEMISTRY

CH101-2

The principles of chemistry, atomic and molecular structure, chemical bonding and stoichiometry are emphasized. The second semester covers equilibrium theory, electrochemistry and qualitative analysis. The laboratory stresses technique experiments and laboratory safety. Three lectures, four hours in laboratory a week. *Four semester hours.*

GENERAL CHEMISTRY

CH103-4

The properties of matter, the gas laws, atomic structure and periodicity will be covered in the first term. The second semester will treat the chemistry of solutions, chemical equilibrium, nuclear chemistry and an introduction to organic chemistry. Three lectures, three hours in laboratory a week. *Four semester hours.*

INTRODUCTION TO CHEMISTRY

CH107-8

Basic principles of physical, organic and biochemistry are developed for application to the techniques used in Forensic science. Required of sophomores in law enforcement program. Three lectures, three hours in laboratory a week. *Four semester hours.*

QUANTITATIVE ANALYSIS

CH201-2

Prerequisites: Ch 101-2. Laboratory and lectures treat the areas of gravimetric analysis, acid-base titrations and the collection and evaluation of data. In the second semester complexometric, gravimetric and redox titrations are emphasized along with basic instrumental systems. Three lectures, four hours in laboratory a week. *Four semester hours.*

ORGANIC CHEMISTRY

CH203-4

Prerequisites: Ch 101-2. In addition to methods of nomenclature for the classes of organic compounds, a detailed treatment of structure, stereochemistry, mechanisms of reactions and synthetic procedures are

discussed. The laboratory work is designed to develop proper techniques and experience in synthesis. Three lectures, four hours in laboratory a week. *Four semester hours.*

CRIMINALISTICS

CH211

Prerequisites: Ch 107-8. An introduction to, and evaluation of, the various scientific aids available for the documentation of physical evidence. Three hours a week. *Three semester hours.*

PHYSICAL CHEMISTRY

CH303-4

Prerequisites: Ch 201-2, Physics 101-2, Math 207. Laws and nature of gases, liquids and solids, properties of solution and thermochemistry. The second semester is a detailed study of types of equilibria, chemical kinetics and electrochemistry. Three lectures, four hours in laboratory a week. *Four semester hours.*

BIOLOGICAL CHEMISTRY

CH305

Prerequisites: Ch 201 and Ch 203. Chemistry of carbohydrates, lipids, proteins, and other materials of biological importance; the transport, reactions and role of these substances in the living organism are treated along with intermediary metabolism and biological oxidation. Three lectures, four hours in laboratory a week. *Four semester hours.*

QUALITATIVE ORGANIC ANALYSIS

CH306

Prerequisites: Ch 201-2 and Ch 203-4. Qualitative and quantitative analysis of selected organic compounds will be used to teach the fundamentals of research techniques in the field of organic chemistry. Two lectures and four laboratory hours a week. *Three semester hours.*

ADVANCED INORGANIC CHEMISTRY

CH401

Prerequisites: Ch 303-4, or approval of the instructor. The consideration of the modern theories of atomic structure, chemical bonding, and molecular structure and their application to various topics in inorganic chemistry such as acid and base theory, ionic crystals, boron hydrides and coordination theory. Three lectures a week. *Three semester hours.*

BIOCHEMISTRY

CH402

Prerequisites: Ch 203-4 and Ch 303-4. Protein structures and conformations, protein interactions, protein assenzymes and equilibria, free energy and kinetics of biological systems are considered. Three lectures, four hours in laboratory a week. *Four semester hours.*

CHEMICAL INSTRUMENTATION

CH403

Prerequisites: Ch 303-4, or approval of the instructor. The theory and application of modern methods of instrumentation useful in chemical analysis will be discussed. Emphasis will be placed on electrochemical methods, spectrophotometry, chromatography and nuclear magnetic resonance. Two lectures, four hours in laboratory a week. *Three semester hours.*

SENIOR RESEARCH AND HONORS

CH490

For chemistry majors. Research problems under faculty direction involving literature search, laboratory work and a written account of results. Will confer honors if other requirements are also fulfilled. *Three semester hours.*

Economics

Dr. Lauréat, J. Bernard, Chairman

An economics major is available for all liberal arts candidates working for B.S. or A.B. degrees. Economic majors are required to complete 30 hours in economics including the following courses: Ec 101, Ec 102, Ec 206, Ec 301, Ec302. M 402 may be substituted for Ec 206.

A minor in economics is open to all degree candidates. A minor must complete Ec 101, Ec 102, and four other three hours courses in economics for a total of 18 hours.

The Economics Division participates in the Honors program.

PRINCIPLES OF ECONOMICS I

EC101

A study of the basic economic principles and institutions which determine the production, exchange, and distribution of wealth in a modern industrial nation. Emphasizes the macro approach. Three hours a week. *Three semester hours.*

PRINCIPLES OF ECONOMICS II

EC102

Prerequisite: Ec 101. Continues Ec 101. Emphasizes the micro approach. Three hours a week. *Three semester hours.*

FINANCIAL ACCOUNTING AND CONTROL I

EC103

A study of the basic principles of accounting and their uses as tools for economic analysis and managerial decision making. May be taken concurrently with EC 101. Three hours a week. *Three semester hours.*

FINANCIAL ACCOUNTING AND CONTROL II

EC104

Prerequisite: Ec 103. Covers such topics as budget administration, cost accounting systems, full and direct costing, differential costing, income determination, and use of return on investment. Three hours a week. *Three semester hours.*

BASIC ECONOMICS

EC107

A one semester economics course specifically designed to meet the needs of the elementary social studies teacher by covering in depth those topics found in the modern social studies curriculum. An elective course not to be considered as prerequisite for advanced study in economics. (Credit cannot be granted for both Ec 107 and Ec 101 or Ec 102). Three hours a week. *Three semester hours.*

LABOR ECONOMICS

EC204

Prerequisite: Ec 102. An analysis of manpower economics including unemployment; labor markets stressing wages and mobility, and unions with an emphasis on collective bargaining and the law. Three hours a week. *Three semester hours.*

ECONOMIC DEVELOPMENT

EC205

Prerequisite: Ec 102. The special problems of growth in under-developed countries: capital requirements, institutional change, population problems, and free market vs. central planning forms the core of this course. Three hours a week. *Three semester hours.*

ECONOMIC STATISTICS

EC206

Prerequisite: EC 102. Required for majors. An analysis of measures of central tendency and dispersion, sampling theory, hypothesis testing, index numbers, regression and correlation analysis, and time series analysis. Three hours a week. *Three semester hours.*

MONEY, BANKING, AND CREDIT

EC207

Prerequisite: Ec 102. A study of the monetary system in the United States including the structure and organization of the Commercial Banking system, the framework and process of Federal Reserve Control, and Non-bank financial intermediaries. Three hours a week. *Three semester hours.*

MONETARY THEORY AND POLICY

EC208

Prerequisites: Ec 207 and Ec 301. An analysis of the Classical Theory of Money, money in the Keynesian system, restatement of the Quantity Theory, Interest Theory, price behavior, and elements of domestic and international monetary policy. Three hours a week. *Three semester hours.*

INTERMEDIATE ECONOMIC THEORY I: MACROECONOMICS

EC301

Prerequisite: Ec 102. Required for majors. Analysis of income determination with emphasis on theories of consumption and investment; development of modern monetary theory; and inflation theory. Three hours a week. *Three semester hours.*

INTERMEDIATE ECONOMIC THEORY II: EC302
MICROECONOMICS

Prerequisite: EC 102. Required for majors. Analysis of economic choice decisions as they effect the individual consumer, the firm, and the resource markets. Three hours a week. *Three semester hours.*

HISTORY OF ECONOMIC THOUGHT EC303

Prerequisite: Ec 102. The development of economic theory from Plato to modern theorists, with emphasis on the classical economists, Marx, and J.M. Keynes. Three hours a week. *Three semester hours.*

GOVERNMENT AND BUSINESS EC304

Prerequisite: EC 102. An analysis of the effect on market performance of government policies to promote competition and regulate monopoly. Three hours a week. *Three semester hours.*

INTERNATIONAL TRADE EC305

Prerequisite: EC 102. Theory of international trade, theory of factor movements, balance of payments, monetary adjustments, effects of tariffs, role of international agencies, and the third world. Three hours a week. *Three semester hours.*

AMERICAN ECONOMIC HISTORY EC306

An analytical study of the growth and development of the American economy from the Colonial period to the present. Three hours a week. *Three semester hours.*

CORPORATE FINANCE EC308

Prerequisites: Ec 102 and Ec 104. Distribution of corporation assets; sources and costs of short- and long-term funds; relevant institutions. Three hours a week. *Three semester hours.*

INVESTMENT PRINCIPLES EC309

Prerequisites: Ec 102 and Ec 104. Criteria for investment decision making; problem of risk, size, and timing of investment; consideration of depreciation and technological change. Three hours a week. *Three semester hours.*

PUBLIC EXPENDITURE AND FINANCE

EC310

Prerequisite: Ec 102. Study of the welfare aspects of spending and taxation on all levels of government; analysis of major kinds of taxes including incidence and policy implications. Three hours a week. *Three semester hours.*

COMPARATIVE ECONOMICS

EC401

Prerequisite: Ec 102. An analytical study of various forms of organizing economic activity, including centrally planned, mixed, and free market economies. Three hours a week. *Three semester hours.*

URBAN ECONOMIC PROBLEMS

EC402

Prerequisite: Ec 102. Analysis of the economic basis of the growth of cities. Study of financial and economic costs of urban growth: manpower, transportation, housing, etc. Three hours a week. *Three semester hours.*

BUSINESS CYCLES AND GROWTH

EC403

Prerequisite: Ec 301. An examination of the growth and fluctuations on income in advanced Western economies, with special attention to the United States since World War II. Three hours a week. *Three semester hours.*

MANAGEMENT ECONOMICS

EC404

Prerequisites: Ec 102 and Ec 104. The decision making process in a business enterprise, cost analysis, linear programming, and the theory of organization. Three hours a week. *Three semester hours.*

SPECIAL TOPICS IN ECONOMICS

EC490

Required of honors candidates. The student will do independent research on a topic determined by the student in consultation with the department chairman. *Three semester hours.*

Elementary Education

Dr. Lawrence J. Newell, Chairman

The elementary and kindergarten-primary curricula have as an objective the thorough professional preparation of teachers at the levels indicated. To this end basic courses are offered and required in general and specific methods of teaching. In addition, experiences in the evaluation of learning and observation of youngsters in the classroom setting are considered essential. To these areas of preparation is added a full semester of supervised student teaching.

The major in Elementary Education includes: Py 102 Educational Psychology; Py 201 Child Psychology; A 325 Art for the Elementary School; Ed 321 Communicative Arts, Reading; Ed 323 Principles and Methods of Teaching; M 305 Basic Modern Mathematics; Pe 301 Physical Education Methods; A 326 Arts and Crafts; Ed 322 Communicative Arts, Language; Ed 328 Social Studies and Science Methods; E 321 Children's Literature; M 326 Mathematics for Elementary Teachers; Ed 422 Educational Measurement; Ms 422 Music for Elementary Grades and Ed 400 Student Teaching and Seminar.

The major in Kindergarten-Primary includes: Py 102 Educational Psychology; Py 201 Child Development; A 315 Art for Kindergarten-Primary Level; Ed 311 Communicative Arts, Reading; Ed 313 Kindergarten-Primary Principles; M 305 Basic Modern Mathematics; Pe 301 Physical Education Methods; A 316 Arts and Crafts; Ed 312 Communicative Arts, Language; Ed 314 Kindergarten-Primary Principles; E 321 Children's Literature; M 316 Mathematics for Kindergarten-Primary; Ed 422 Educational Measurement; Ms 411 Kindergarten-Primary Music and Ed 400 Student Teaching and Seminar.

COMMUNICATIVE ARTS, READING

ED311

Required of Juniors who elect the Kindergarten-Primary curriculum. The course is concerned with the teaching of reading at kindergarten and primary grade levels. Two hours a week. *Two semester hours.*

COMMUNICATIVE ARTS, LANGUAGE ED312
Required of Juniors who elect the Kindergarten-Primary curriculum. The course deals with the teaching of language arts as creative tools of communication at the kindergarten and primary grade levels. Two hours a week. *Two semester hours.*

KINDERGARTEN-PRIMARY PRINCIPLES ED313-314
Required of Juniors who elect the Kindergarten-Primary curriculum. This course develops lesson planning, unit construction, assignments, materials and curricula of kindergarten and each of the primary grades. These two courses must be taken in sequence. Two hours a weeks. *Two semester hours, each course.*

COMMUNICATIVE ARTS, READING ED321
Required of Juniors who elect the Elementary curriculum. The prime emphasis of the course will focus on the developmental nature of reading. Two hours a week. *Two semester hours.*

COMMUNICATIVE ARTS, LANGUAGE ED322
Required of Juniors who elect the Elementary curriculum. Listening, writing and speaking as areas of communication are the main emphasis of this course. Two hours a week. *Two semester hours.*

PRINCIPLES AND CURRENT TECHNIQUES
OF TEACHING ED323
Required of Juniors who elect the Elementary Curriculum. This course includes a study of the teaching-learning process, desired learning outcomes, and the guiding principles for effective planning and teaching in the elementary school. In addition there will be ample opportunity to observe and participate in the classrooms of the laboratory school. Two hours a week. *Two semester hours.*

SOCIAL STUDIES AND SCIENCE METHODS ED328
Required of Juniors who elect the Elementary curriculum. An examination of the methods and materials basic to carrying on a program in social studies and science in the Elementary grades. Two hours a week. *Two semester hours.*

STUDENT TEACHING AND SEMINAR ED400
Required of Seniors in Kindergarten-Primary and Elementary courses. A laboratory course of 16 weeks duration providing full-time student teaching in public schools. *Fourteen semester hours.*

EDUCATIONAL MEASUREMENT ED422
Required of Seniors who elect the Elementary or Kindergarten-Primary programs. A survey of measurement and evaluation procedures as they apply to the day-by-day activities of the Elementary school teacher. Two hours a week. *Two semester hours.*

STUDENT TEACHING AND SEMINAR ED500
Required of Graduate students. A laboratory course of eight weeks duration providing full-time student teaching in public schools. *Six semester hours.*

ART FOR ELEMENTARY TEACHERS ED513
An introduction to various philosophies of Art education will be presented. Experiences will also be offered to give a working knowledge of basic techniques in two and three dimensional art deemed essential for application to the grade levels concerned within this course. Two hours a week, third quarter. *One semester hour.*

MUSIC FOR ELEMENTARY TEACHERS ED515
This course includes a study of the philosophies underlying the teaching of music in the elementary school and of the materials and methods suitable for use in these grades. Two hours a week, third quarter. *One semester hour.*

TEACHING MODERN MATHEMATICS AND SCIENCE ED516
This course is designed to acquaint the prospective elementary teacher with the latest techniques for teaching modern mathematics and science. Three hours a week, first semester. *Three semester hours.*

GENERAL METHODS FOR ELEMENTARY EDUCATION ED521
Required of graduate students who are preparing to teach in the elementary schools. This course will introduce the graduate student to this field of education and will discuss historical and current principles, issues and trends. Three hours a week, first semester. *Three semester hours.*

METHODS IN SOCIAL STUDIES ED522
Required of graduate students. This course will deal with the teaching of the social sciences to elementary school children. Four hours a week, third quarter. *Two semester hours.*

EDUCATIONAL MEASUREMENT ED523
A survey of the nature of measurement and evaluation in relation to the process of teaching. The course will emphasize the construction of tests, the evaluation of standardized instruments and the statistical ideas and operations needed for proper interpretation and use of tests' results. Four hours a week, third quarter. *Two semester hours.*

READING AND LANGUAGE ARTS METHODS ED524
A required course in the graduate school. This course will stress the developmental nature of the communicative arts and will emphasize the teaching of reading, spelling, speaking, listening, writing, vocabulary development and grammatical structure. Three hours a week, first semester. *Three semester hours.*

GEOGRAPHY FOR ELEMENTARY TEACHERS ED527G
The major thrust of this course is to impart concepts of inquiry as a geographic and scientific method. Role playing and simulation will be stressed through the use of content oriented problems in Geographic and Earth Science disciplines. Two hours a week, first semester. *Two semester hours.*

Secondary Education

Dr. William J. Fitzpatrick, Chairman

This department offers those courses which give the student the necessary qualifications for teaching in a secondary school. Theory and practice are inter-related to provide the finest possible experience for entrance into the education profession. The minor in secondary education consists of the following courses: Py 310, Educational Psychology; Py 231, Adolescent Psychology; Ed 333, Procedures for Teaching in the Secondary School; Ed 336, Methods of Teaching (The specific subject) in the Secondary School; Ed 334, Curriculum of the Secondary School; Ed 337, History and Principles of Secondary Education, Ed 431, Tests and Measurements. In addition Ed 430, Student Teaching, is required for certification and recommendation.

PROCEDURES FOR TEACHING IN THE SECONDARY SCHOOL

ED333

Required of Juniors in the Secondary Education curriculum. This course includes a study of the nature and the development tasks of the adolescent and the role of the teacher in establishing a favorable setting for learning. Three hours a week. *Three semester hours.*

CURRICULUM OF THE SECONDARY SCHOOL

ED334

This course is required in the Secondary Education program. Among the major topics to be covered in this course are the following: horizontal and vertical patterns of organization and criteria for curriculum evaluation. Two hours a week. *Two semester hours.*

METHODS OF TEACHING BIOLOGY IN THE SECONDARY SCHOOL

ED336-BI

Prerequisite: Ed 333. Required of Juniors majoring in Biology in the Secondary School Curriculum. This course includes a consideration of the aims and principles involved in the teaching of Biology. Three hours a week. *Three semester hours.*

METHODS OF TEACHING ENGLISH IN THE
SECONDARY SCHOOL

ED336-E

Prerequisite: Ed 333. Required of Juniors majoring in English in the Secondary School Curriculum. This course includes a consideration of the aims and principles involved in the teaching of grammar, composition, and literature. Three hours a week. *Three semester hours.*

METHODS OF TEACHING GEOGRAPHY AND EARTH
SCIENCE IN THE SECONDARY SCHOOLS

ED336-GE

Prerequisite: Ed 333. This course is to be required of all Secondary Education students majoring in Geography and Earth-Science in the junior year. Emphasis will be placed upon ESCP and Project Geography Materials and Methods as well as innovations and recent developments. Three hours a week. *Three semester hours.*

METHODS OF TEACHING SOCIAL STUDIES IN THE
SECONDARY SCHOOL

ED336-H

Prerequisite: Ed 333. Required of Juniors majoring in Social Studies in the Secondary School Curriculum. This course includes a consideration of the aims and principles involved in the teaching of History, Geography, Government, Economics, and Problems of Democracy. Three hours a week. *Three semester hours.*

METHODS OF TEACHING MODERN LANGUAGES
IN THE SECONDARY SCHOOL

ED336-L

Prerequisite: Ed 333. Required of Juniors majoring in French or Spanish in the Secondary School Curriculum. This course includes a consideration of the principles of language learning along with the methods and materials for teaching modern languages. Three hours a week. *Three semester hours.*

METHODS OF TEACHING MATHEMATICS
IN THE SECONDARY SCHOOL

ED336-M

Prerequisite: Ed 333. Required of Juniors majoring in Mathematics in the Secondary School Curriculum. This course includes a consideration of the aims and principles involved in the teaching of mathematics. Three hours a week. *Three semester hours.*

METHODS OF TEACHING SCIENCE IN THE
SECONDARY SCHOOL

ED336-PS

Prerequisite: Ed 333. Required of Juniors majoring in Science in the Secondary School Curriculum. This course includes a consideration of the aims and principles involved in the teaching of astronomy, chemistry, geology and physics. Three hours a week. *Three semester hours.*

HISTORY AND PRINCIPLES
OF SECONDARY EDUCATION

ED337

This course is required of all Juniors in the Secondary Education Program. It will examine the historical foundations of secondary education in the United States with its particular reference to early and contemporary European schools. Three hours a week. *Three semester hours.*

URBAN EDUCATION

ED338

This is an elective course for Sophomores and Juniors. There will be two hours per week of class on campus and two hours per week in practicum. The latter will consist of visits to urban schools. *Three semester hours.*

AUDIO—VISUAL MEDIA IN EDUCATION

ED339

This is an elective course. It emphasized the effective use of various audio-visual media as they influence the learning process. Three hours a week. *Three semester hours.*

DIRECTED STUDY IN THE FIELD
OF SECONDARY EDUCATION

ED340

This course is open to all students in the field of Secondary Education. Each student must submit a contract approved by the Chairman of the Department of Secondary Education prior to his registration for this course. *Three semester hours.*

IMPROVED READING SKILLS IN THE SECONDARY SCHOOL

ED341

This is an elective course open to upperclassmen who have had a course in educational or adolescent psychology. The course is designed to acquaint secondary majors with those reading skills appropriate for success in the content areas, and to help them develop strategy for teaching such skills. Three hours a week. *Three semester hours.*

STUDENT TEACHING AND SEMINAR

ED430

Required of Seniors in the Secondary Curriculum. A laboratory course of eight weeks duration providing full-time student teaching in public secondary schools. The Seminar is concerned with fresh topics such as professional ethics, school records, securing a teaching position, current trends in education, and in-service professional growth. *Seven semester hours.*

TESTS AND MEASUREMENTS

ED431

Required of students studying secondary education. This course includes the development of measurement in education and the statistical analysis of test results. Six hours a week for one quarter. *Three semester hours.*

STUDENT TEACHING AND SEMINAR

ED500

Required of Graduate students. A laboratory course of eight weeks duration providing full-time student teaching in public schools. *Six semester hours.*

TESTS AND MEASUREMENTS FOR SECONDARY TEACHERS

ED531

This is a "How to" course: How to understand current educational research and the construction and use of standardized and teacher made tests. Four hours a week , third quarter. *Two semester hours.*

PRINCIPLES OF SECONDARY EDUCATION

ED533

This course will examine public education in the United States. The emerging role of the classroom teacher in the development and

direction of critical issues and trends will be examined and appraised. Three hours a week, first semester. *Three semester hours.*

METHODS OF TEACHING BIOLOGY ED536B

Required of graduate students who are preparing to teach Biology in the secondary school. Two hours a week, first semester. *Two semester hours.*

METHODS OF TEACHING ENGLISH ED536-E

Required of graduate students who are preparing to teach English at the secondary level. This course includes a consideration of the aims and principles involved in the teaching of composition and literature and the readings of representative texts and scientific studies. Two hours a week. *Two semester hours.*

METHODS OF TEACHING FRENCH ED536-F

Required of graduate students who are preparing to teach French in the secondary school. Two hours a week. *Two semester hours.*

METHODS OF TEACHING SPANISH ED536-SP

Required of graduate students preparing to teach Spanish in secondary schools. Two hours a week. *Two semester hours.*

METHODS IN SOCIAL STUDIES ED536-H

Required of graduate students who are preparing to teach social studies at the secondary level. This course includes a consideration of the aims and principles involved in teaching of social studies. Two hours a week. *Two semester hours.*

METHODS OF TEACHING SECONDARY SCHOOL MATHEMATICS ED536-M

Required of graduate students who are preparing to teach in secondary schools. In this course instruction is given in methods of teaching mathematics in Grades VII-XII. Two hours a week. *Two semester hours.*

THE TEACHING OF GENERAL SCIENCE

ED536-PS

Required of graduate students who are preparing to teach science at the secondary school level. Representative topics to be treated include the techniques of demonstration and the selection and use of reference material and test material. Two hours a week. *Two semester hours.*

English

Richard S. Tyrell, Chairman

The Department of English offers to all students instruction in writing and speech, and introductory courses in British and American Literature. It further offers courses in linguistics and in literature, by period of type, from Chaucer to the present day.

The English composition requirement may be satisfied by the achievement of a score of 5, 4, or 3 in the Advanced Placement Test of the CEEB. If a student attains an A in E 101, he may begin the literature sequence in the second semester. Students may satisfy the Speech requirement by passing a proficiency examination during the Sophomore year.

The requirement for the A.B. or B.S. major concentration shall consist of thirty-six hours taken in the Department of English. All students majoring in English must take the two semester survey of English Literature (E 201-202) and the two semester survey of American Literature (E 205-206). E 433 is required of English majors in the teaching curricula, E 434 is required of those in the non-teaching curricula and strongly recommended for those in the teaching curricula. The Department of English also recommends that students majoring in English study a modern language.

During 1970-71, English majors may take for credit L 111, Introduction to Linguistics, and FL 210, Methodology and Practice in English to Speakers of Other Languages, given by the Department of Foreign Languages.

The requirement for the A.B. or B.S. minor concentration shall consist of twenty-one hours taken in the Department of English. All

students minoring in English must take the two semester survey of English Literature (E 201-202) and three upper division electives selected with the approval of a departmental advisor.

Students are urged to consult departmental advisors before determining course selection.

ENGLISH COMPOSITION E101-102

Required of Freshmen. The course includes a review of formal grammar, training in sentence structure and paragraph development, and instruction in the writing of expository themes. Assigned readings. Three hours a week. *Three semester hours, each course.*

MAJOR BRITISH WRITERS I E201

A study of major works by Chaucer, Shakespeare, Donne, Milton, Pope, and Swift. Three hours a week. *Three semester hours.*

MAJOR BRITISH WRITERS II E202

A study of major works by Wordsworth, Keats, Tennyson, Browning, Yeats, and Eliot. Three hours a week. *Three semester hours.*

MASTERPIECES OF WESTERN LITERATURE I E203

Readings and discussion of selected masterpieces of western literature from classical antiquity through the Renaissance. Three hours a week. *Three semester hours.*

MASTERPIECES OF WESTERN LITERATURE II E204

A continuation of E203 involving the study of masterpieces of western literature from the Enlightenment through the twentieth century. Three hours a week. *Three semester hours.*

AMERICAN WRITERS I E205

A study of American writers from the Colonial period to Whitman. Three hours a week. *Three semester hours.*

AMERICAN WRITERS II E206

A study of American writers from Twain to the present. Three hours a week. *Three semester hours.*

- SHAKESPEARE I THE TRAGEDIES E301
Three hours a week. *Three semester hours.*
- SHAKESPEARE II E302
The comedies and history plays. Three hours a week. *Three semester hours.*
- THE ROMANTIC MOVEMENT E303
A study of the poetry of Blake, Wordsworth, Coleridge, Byron, Shelley, and Keats. Three hours a week. *Three semester hours.*
- NINETEENTH CENTURY PROSE I E305
A study of the novels of Austen, Scott, and Dickens, and the major works of Carlyle, Macaulay, and Mill. Three hours a week. *Three semester hours.*
- NINETEENTH CENTURY PROSE II E306
A study of the novels of Thackeray, George Eliot, Meredith, and Hardy, and the major prose works of Newman, Arnold, Stevenson, Ruskin, Morris, and Pater. Three hours a week. *Three semester hours.*
- MODERN DRAMA I E307
A study of major modern dramatists and their work starting with Ibsen. Three hours a week. *Three semester hours.*
- MODERN DRAMA II E308
A continuation of E 307, with primary stress on more recent dramatists and trends in drama. E 308 may be taken by students who have not taken E 307, although E 307 offers desirable preparation. Three hours a week. *Three semester hours.*
- MILTON E310
Horton poems; *Areopagitica* and other prose works; sonnets; *Paradise Lost*, *Paradise Regained*, *Samson Agonistes*. Three hours a week. *Three semester hours.*

ENGLISH LITERATURE, 1660-1749 E311

The major writers of the Restoration and Augustan periods, exclusive of Milton. Primary attention is paid to Dryden, Pope, and Swift. Three hours a week. *Three semester hours.*

OLD AND MIDDLE ENGLISH LITERATURE E312

A study in translation of selected masterpieces in various genres from Anglo-Saxon times to 1500, exclusive of Chaucer. *Beowulf*, *Sir Gawain and the Green Knight*, *Piers Plowman*, Malory's *Morte d'Arthur* (in part), romances, ballads, lyric poems, plays. Three hours a week. *Three semester hours.*

ENGLISH LITERATURE IN THE RENAISSANCE E313

A study of the major non-dramatic works of the sixteenth century with emphasis upon Spenser, Shakespeare, Donne, and Jonson. Three hours a week. *Three semester hours.*

LITERARY CRITICISM E314

A course in criticism intended primarily for majors in English and designed to acquaint them with the vocabulary of criticism through a diagnostic and topical approach to modes (heroic, tragic, lyric) and techniques (classicism, romanticism, symbolism, myth). Three hours a week. *Three semester hours.*

CHAUCER I E315

A study of Chaucer's minor poetry and *Troilus and Criseyde* in the original language. Three hours a week. *Three semester hours.*

CHAUCER II E316

A study of *The Canterbury Tales* in the original language. Three hours a week. *Three semester hours.*

LITERATURE FOR CHILDREN E321

Required of Juniors in the Kindergarten-primary and elementary curricula. The aims of the course are to acquaint the students with the field of children's literature and to provide them with a standard of

judgment for the evaluation of children's books. Three hours a week.
Three semester hours.

ADVANCED WRITING I E322

A course for students interested in doing considerable advance expository and creative writing. The course includes reading in contemporary and classical works. Three hours a week. *Three semester hours.*

ADVANCED WRITING II E323

A continuation of E322, which is a prerequisite. Three hours a week.
Three semester hours.

AMERICAN LITERATURE I E331

Required in the junior year of English majors who entered the College prior to September, 1969. A study of American Literature from Emerson to Whitman. Three hours a week. *Three semester hours.*

AMERICAN LITERATURE II E332

A continuation in E331. A study of American literature from Mark Twain to Eliot. Three hours a week. *Three semester hours.*

THE AGE OF JOHNSON E402

A study of major works of English literature written during the second half of the eighteenth century. Three hours a week. *Three semester hours.*

EMERSON, THOREAU, AND TRANSCENDENTALISM E403

A study of American romantic idealists. In a broader sense, the course undertakes a study of the social and intellectual movements of the first half of the nineteenth century. Three hours a week. *Three semester hours.*

VICTORIAN POETRY E404

A study of the poetry of Tennyson, Browning, Arnold, the Rossettis, Morris, Swinburne, Meredith, Hardy and Hopkins. Three hours a week.
Three semester hours.

THE MODERN NOVEL E406

The course includes an analysis of the novel as an art form, a survey of the novel in English and American literature, and the reading of ten notable modern novels. Three hours a week. *Three semester hours.*

MODERN SHORT STORY E407

A study of selected American and British short stories. Three hours a week. *Three semester hours.*

HAWTHORNE, MELVILLE, AND JAMES E408

A course of reading and discussion of the major works of these writers. Three hours a week. *Three semester hours.*

ENGLISH DRAMA, EXCLUSIVE OF
SHAKESPEARE, 1580-1642 E410

A reading of major dramas of the Elizabethan and Jacobean periods. Three hours a week. *Three semester hours.*

ENGLISH LITERATURE, 1600-1660 E411

The major writers of the period exclusive of the dramatists. Three hours a week. *Three semester hours.*

RESTORATION DRAMA E412

A reading of major dramas of the Restoration period, 1660-1700. Three hours a week. *Three semester hours.*

CONTEMPORARY POETRY E413

A reading of selected contemporary poets, American and British. Three hours a week. *Three semester hours.*

MODERN IRISH WRITERS E415

A study of the poetry, plays, and fiction of major and minor writers from Yeats to Devlin. Three hours a week. *Three semester hours.*

BLACK AMERICAN LITERATURE I E416

A study of major works of Black American Literature from slavery to

the Harlem Renaissance comprise this course. It will include folk tales and slave narratives. Three hours a week. *Three semester hours.*

BLACK AMERICAN LITERATURE II

E417

This course is a continuation of E 416. It is a study of the major works of Black American Literature from the Harlem Renaissance to contemporary writings from Langston Hughes to Don L. Lee. Three hours a week. *Three semester hours.*

FOLKLORE

E419

An introductory study of the major forms of folklore including the folktale, myth, folksong, riddle, superstition, proverb, and children's folklore. Current theoretical trends in folklore will also be considered. Readings will be in English from selected international folk sources. Three hours a week. *Three semester hours.*

MAJOR AMERICAN WRITERS

E421

Required of Seniors not majoring in English. A study of major figures in American literature. Three hours a week or its equivalent. *Three semester hours.*

THE STRUCTURE OF THE ENGLISH LANGUAGE

E433

A course in the grammatical, morphological, and syntactical structure of the English language. This course is required of English majors in the teacher-training program. Three hours a week. *Three semester hours.*

THE HISTORY OF THE ENGLISH LANGUAGE

E434

A course in the historical development of the English language. Illustrative readings from its various periods. This course is required of English majors in the non-teaching curriculum; elective for others. Three hours a week. *Three semester hours.*

SPECIAL TOPICS

E490

Research seminar. Required of candidates for honors in English during the second semester of the junior year. Three hours a week. *Three semester hours.*

SENIOR SEMINAR E492
Topics in Twentieth Century American Fiction. An intensive study of selected authors and topics reflective of the contemporary scene. Reports will be given and conferences held. Three hours a week. *Three semester hours.*

CONTEMPORARY BRITISH AND AMERICAN LITERATURE I E501
Required of graduate students majoring in English. A study of the contributions of present day writers in prose fiction and biography. Three hours a week. *Three semester hours.*

CONTEMPORARY BRITISH AND AMERICAN LITERATURE II E502
Required of graduate students majoring in English. A study of the contributions of present day writers in drama and poetry. Four hours a week, for one quarter. *Two semester hours.*

MODERN FICTION SEMINAR E503
A choice reading of selected texts to analyze themes and techniques characteristic of leading practitioners of modern fiction in England and America. Discussion, research, critical papers. Four hours a week, third quarter. *Two semester hours.*

CHILDREN'S LITERATURE E521
Required of graduate students in the elementary curriculum. Two hours a week. *Two semester hours.*

Speech and Communications

Courses in speech and communications are offered by the Department of English. The following courses are designed to provide students with practical training in oral and written communication. A value not only to prospective teachers but also to those whose future occupations may include writing of a commercial as distinct from literary nature.

EFFECTIVE SPEECH

E103

Students may satisfy the speech requirement by successfully passing, during the Sophomore year, the proficiency examination given by the Speech Department. Two hours a week. *Zero semester hours.*

ORAL INTERPRETATION

E104

Elective for sophomores and juniors. Intensive work in the basic principles of voice and diction through exercise, tape recordings, and readings. This is essentially a study of various forms of literature to help students learn meaningful expression of prose, poetry, and drama through oral communication. Three hours a week. *Three semester hours.*

THE WRITING LABORATORY

E210

Preparation of weekly short papers or scripts, to be read and evaluated in class. These shorter forms of writing will embrace the straight news story, the feature, the interview, the editorial, the critical review, and advertising copy. Juniors and Seniors only. Three hours a week. *Three semester hours.*

Foreign Languages

Dr. Richard W. Newman, Chairman

Courses in French, German, and Spanish, offered by the Department of Foreign Languages are designed to meet the needs of three classes of students: a.) Those who wish to fulfill the foreign language requirement for the A.B. degree; b.) Those who wish to take foreign languages for general cultural purposes; and c.) Those who wish to major or minor in a foreign language. The curriculum, both for those preparing to become teachers and those intending to pursue graduate studies, is designed to give students an active command of their major language and a broad insight into the corresponding literature and culture. There are many promising careers for foreign language majors; in education, business, industry, and government. The Department also offers courses in both

theoretical and applied linguistics. Theoretical linguistics if offered as a general cultural elective especially recommended to English and Foreign Language Majors and applied linguistics courses are offered in each of the major languages. Besides the course in the teaching of foreign languages at the secondary level, special courses are offered in methodology of Foreign Languages at the elementary level (FLES) and in English to Speakers of Other Languages (ESOL).

Examples of course combinations satisfying the foreign language requirement for the A.B. degree:

- (1) Sp 111-112 (Elementary Spanish) and Sp 121-122 (Intermediate Spanish); four courses, 12 semester hours.
- (2) Gr 131-132 (Advanced (German)); two courses, 6 semester hours.
- (3) F 121-122 (Intermediate French) and F 131-132 (Advanced French); four courses, 12 semester hours.

Scores in the appropriate achievement test of the C.E.E.B. are used for correct placement in courses and a student receiving a score of 575 or above in one of these examinations has satisfied the language requirement.

REQUIREMENTS FOR MAJORS

Language majors must complete 30 semester hours in their major language. The following courses are required of all majors:

- 211-212 Survey of Literature
- 311-312 Composition and Conversation
- 424 Spoken
- 1 Literature course above the Survey level
- 1 Civilization course

Teacher preparation candidates must elect 314 Applied Linguistics, Ed 336L Methods of Teaching Modern Languages in the Secondary School. Non-teaching majors must elect 510 Seminar. The MIA Cooperative Foreign Language Proficiency Tests are required of all majors and will be administered in the Department.

REQUIREMENTS FOR MINORS

Language minors must complete 21 semester hours in their minor language. Course selections should be made with the advice of the Chairman of the Foreign Language Department and the student's advisor in his own major Department.

French

PROGRAMMED ELEMENTARY FRENCH

F110

A special course designed for Foreign Language majors who wish to begin a minor language. Open to students with permission of Department Chairman. Five hours a week. *Three semester hours.*

ELEMENTARY FRENCH

F111-112

Development of basic skills: aural comprehension, oral and written composition, reading ability. Language laboratory. Three hours a week. *Three semester hours, each course.*

INTERMEDIATE FRENCH

F121-122

Prerequisite: F111-112 or two or three years of high school French. Grammar review, oral practice, extensive reading, simple written composition. Language Laboratory. Three hours a week. *Three semester hours, each course.*

ADVANCED FRENCH

F131-132

Prerequisite: F121-122 or four or five years of high school French. Constant development of aural and oral skills, intensive reading, written composition. Three hours a week. *Three semester hours, each course.*

DEVELOPMENT OF READING SKILLS IN FRENCH

F142

Prerequisite: F131. Techniques for examining and appreciating literary texts. Three hours a week. *Three semester hours.*

SURVEY OF FRENCH LITERATURE

F211-212

Prerequisite: F131-132. Representative readings of works from the

Middle Ages to the present. Lectures, discussions, readings and reports. Conducted in French. Three hours a week. *Three semester hours, each course.*

FRENCH COMPOSITION AND CONVERSATION F311-312

Prerequisite: F131-132. Advanced training in rapid and idiomatic French speech and writing. Three hours a week. *Three semester hours, each course.*

FRENCH LITERATURE OF THE SEVENTEENTH CENTURY F321

Prerequisite: F211-212. A study of the Classical period with special emphasis given to the theater. Lectures, discussions, readings, and reports. Conducted in French. Three hours a week. *Three semester hours.*

FRENCH LITERATURE OF THE EIGHTEENTH CENTURY F322

Prerequisite: F211-212. A study of the Age of Enlightenment. Lectures, discussions, readings, and reports. Conducted in French. Three hours a week. *Three semester hours.*

FRENCH LITERATURE OF THE NINETEENTH CENTURY F331

Prerequisite: F 211-212. A study of the Romantic movement with emphasis on lyric poetry and drama and of the Realist movement with emphasis on the novel. Conducted in French. Three hours a week. *Three semester hours.*

FRENCH LITERATURE OF THE TWENTIETH CENTURY F332

Prerequisite: F211-212. A study of the French novel and drama since World War I. Lectures, discussions, readings and reports. Conducted in French. Three hours a week. *Three semester hours.*

FRENCH LITERATURE OF THE MIDDLE AGES
AND THE RENAISSANCE

F342

Prerequisite: F 211-212. A study of the *chanson de geste*, the courtly novel, the religious and secular theater of the Middle Ages and of the prose and poetry of the Renaissance. Three hours a week. *Three semester hours.*

ADVANCED FRENCH COMPOSITION AND STYLISTICS

F411

Prerequisite: F 311-312. Introduction to the problems of style and a study of selected grammatical topics. Translations to and from French. Three hours a week. *Three semester hours.*

FRENCH CIVILIZATION

F421-422

Prerequisite: F 311-312. The course includes the necessary background in history, geography, social institutions, and culture for the advanced French student. Conducted in French. Three hours a week. *Three semester hours, each course.*

SPOKEN FRENCH

F424

Prerequisite: F 311-312. Discussion and oral reports in French on topics of cultural significance and general interest. Three hours a week. *Three semester hours.*

SEMINAR IN FRENCH

F510

Required of Honors Candidates and open to others with permission of the Department Chairman. Special topics of literary research. One two-hour meeting per week. *Three semester hours.*

German

PROGRAMMED ELEMENTARY GERMAN

GR110

A special course designed for Foreign Language majors who wish to begin a minor language. Open to students with permission of Department Chairman. Five hours a week. *Three semester hours.*

ELEMENTARY GERMAN GR111-112
Development of basic skills: aural comprehension, oral and written composition, reading ability. Language laboratory. Three hours a week. *Three semester hours, each course.*

INTERMEDIATE GERMAN GR121-122
Prerequisite: GR 111-112 or two or three years of high school German. Grammar review, oral practice, extensive reading, simple written composition. Language laboratory. Three hours a week. *Three semester hours, each course.*

ADVANCED GERMAN GR131-132
Prerequisite: Gr 121-122 or four or five years of high school German. Constant development of aural and oral skills, intensive reading, written composition. Three hours a week. *Three semester hours, each course.*

SURVEY OF GERMAN LITERATURE GR211-212
Prerequisite: Gr 131-132. Representative readings of works from the Middle Ages to the present. Lectures, discussions, readings and reports. Conducted in German. Three hours a week. *Three semester hours, each course.*

GERMAN COMPOSITION AND CONVERSATION GR311-312
Prerequisite: Gr 131-132. Advanced training in rapid and idiomatic German speech and writing. Three hours a week. *Three semester hours, each course.*

GERMAN LITERATURE OF THE
EIGHTEENTH CENTURY GR322
Prerequisite: Gr 211-212. A study of the Classical period with special emphasis given to novel and drama. Lectures, discussions, readings, and reports. Conducted in German. Three hours a week. *Three semester hours.*

GERMAN LITERATURE OF THE
NINETEENTH CENTURY GR331
Prerequisite: Gr 211-212. A study of the novel, drama, lyric poetry and

novelle of the Romantic and Realist periods. Lectures, discussions, readings, and reports. Three hours a week. *Three semester hours.*

GERMAN LITERATURE OF THE
TWENTIETH CENTURY

GR342

Prerequisite: Gr 211-212. The course includes a study of the movie, drama, and lyric poetry of the contemporary period. Three hours a week. *Three semester hours.*

GERMAN CIVILIZATION

GR422

Prerequisite: Gr 131-132. A study of German history, geography, social institutions and contemporary German culture. Conducted in German. Three hours a week. *Three semester hours.*

SPOKEN GERMAN

GR424

Prerequisite: Gr 311-312. Discussions and oral reports in German on topics of cultural significance and general interest. Three hours a week. *Three semester hours.*

SEMINAR IN GERMAN

GR510

Required of Honors candidates and open to others with permission of the Department Chairman. Special topics of literary research. One two-hour lecture a week. *Three semester hours.*

Linguistics

INTRODUCTION TO LINGUISTICS

L111

Principles of language analysis: phonetics, phonemics, morphology, and syntax. Three hours a week. *Three semester hours.*

APPLIED LINGUISTICS: FRENCH

F314

Prerequisite: F 311-312. Linguistic analysis of French phonology, morphology, and syntax and a systematic comparison of the structures of French and English. Three hours a week. *Three semester hours.*

APPLIED LINGUISTICS: GERMAN

GR314

Prerequisite: Gr 311-312. Linguistic analysis of German phonology, morphology, and syntax and a systematic comparison of the structures of German and English. Three hours a week. *Three semester hours.*

APPLIED LINGUISTICS: SPANISH

SP314

Prerequisite: Sp 311-312. Linguistic analysis of Spanish phonology, morphology, and syntax and a systematic comparison of the structures of Spanish and English. Three hours a week. *Three semester hours.*

Spanish

PROGRAMMED ELEMENTARY SPANISH

SP110

A special course designed for Foreign Language majors who wish to begin a minor language. Open to students with permission of Department Chairman. Five hours a week. *Three semester hours.*

ELEMENTARY SPANISH

SP111-112

Development of basic skills: aural comprehension, oral and written composition, reading ability. Language laboratory. Three hours a week. *Three semester hours, each course.*

INTERMEDIATE SPANISH

SP121-122

Prerequisite: Sp 111-112 or two or three years of high school Spanish. Grammar review, oral practice, extensive reading, simple written composition. Language laboratory. Three hours a week. *Three semester hours, each course.*

ADVANCED SPANISH

SP131-132

Prerequisite: Sp 121-122 or four or five years of high school Spanish. Constant development of aural and oral skills, intensive reading, written composition. Three hours a week. *Three semester hours, each course.*

DEVELOPMENT OF READING SKILLS IN SPANISH

SP142

Prerequisite: Sp 131. Techniques for examining and appreciating

literary texts. Three hours a week. *Three semester hours.*

SURVEY OF SPANISH LITERATURE SP211-212

Prerequisite: Sp 131-132. Representative readings of works from the Middle Ages to the present. Lectures, discussions, readings, and reports. Three hours a week. *Three semester hours, each course.*

SPANISH COMPOSITION AND CONVERSATION SP311-312

Prerequisite: Sp 131-132. Advanced training in rapid and idiomatic Spanish speech and writing. Three hours a week. *Three semester hours, each course.*

SPANISH DRAMA OF THE GOLDEN AGE SP321

Prerequisite: Sp211-212. Study of the precursors and major dramatists. Lectures, discussions, readings, and reports. Conducted in Spanish. Three hours a week. *Three semester hours.*

SPANISH PROSE OF THE GOLDEN AGE SP322

Prerequisite: 211-212. Study of short story and novel with special emphasis on the Quijote. Lectures, discussions, readings, and reports. Conducted in Spanish. Three hours a week. *Three semester hours.*

SPANISH LITERATURE OF THE
NINETEENTH CENTURY SP331

Prerequisite: 211-212. A study of the Romantic movement with emphasis on the lyric poetry and drama and of the Realist movement. Three hours a week. *Three semester hours.*

SPANISH LITERATURE OF THE
TWENTIETH CENTURY SP332

Prerequisite: Sp 211-212. Study of the novel, drama, and lyric poetry from 1898 to the present. Three hours a week. *Three semester hours.*

SPANISH-AMERICAN LITERATURE SP342

Prerequisite: Sp 211-212. Representative readings from the colonial period to the present. Lectures, discussions, readings, and reports.

Conducted in Spanish. Three hours a week. *Three semester hours.*

HISPANIC CIVILIZATION SP422

Prerequisite: Sp 131-132. A study of Spanish history, geography, social institutions and contemporary Hispanic culture. Conducted in Spanish. Three hours a week. *Three semester hours.*

SPANISH AMERICAN CIVILIZATION SP423

Prerequisite: Sp 311-312. A study of the history, geography, social institutions and the contemporary culture of the Spanish-American republics. Conducted in Spanish. Three hours a week. *Three semester hours.*

SPOKEN SPANISH SP424

Prerequisite: Sp 311-312. Discussion and oral reports in Spanish on topics of cultural significance and general interest. Three hours a week. *Three semester hours.*

SEMINAR IN SPANISH SP 510

Required of Honors candidates and open to others with permission of the Department Chairman. Special topics of literary research. One two-hour lecture a week. *Three semester hours.*

Teaching Methodology

METHODS OF TEACHING MODERN LANGUAGES
IN THE SECONDARY SCHOOL ED336L

See description under SECONDARY EDUCATION

STUDENT TEACHING AND SEMINAR ED430

See description under SECONDARY EDUCATION.

METHODOLOGY AND PRACTICE IN FLES FL110

This course will present a general introduction to the teaching of Foreign Language in the Elementary School (FLES). Bibliography,

study of second language learning, an analysis of currently-used methods of instruction, observation and practice in FLES classes. Open to students in either the Elementary or Secondary Education program who have completed 18 semester hours in a foreign language. *Three semester hours.*

METHODOLOGY AND PRACTICE IN ESOL

FL210

This course will present a general introduction to the teaching of English to Speakers of Other Languages (ESOL). Bibliography, study of second language learning, analysis of currently-used methods of instruction, observation and practice in ESOL classes. Open to students in either the Elementary or Secondary Education program who have completed at least 18 semester hours of English. *Three semester hours.*

Geography

Dr. James P. Jones, Chairman

The discipline of geography is an academic construct to bridge the natural sciences and social sciences. The causal development of the physical environment and area distribution of climate, vegetation, land forms, and natural resources is correlated with the cultural features of the landscape as instituted by man. Thus, the interrelationships that exist between man and his environment are the basic understanding which result from a study of geography.

Majors and minors in geography are required to fulfill the following minimum requirements; G 301 Principles of Physical Geography, G 302 Principles of Human Geography plus additional courses in geography selected from the department offerings. Careful selection of courses may result in concentrations within the Geography Major revolving about 1) Urban Geography and 2) Economic Geography. Course elections must be made with the guidance of the Department Chairman.

PRINCIPLES OF PHYSICAL GEOGRAPHY

G301

The purpose of this course is to develop an awareness, understanding,

and appreciation of the elements of man's natural environment. The utilization of the tools of geography will be stressed throughout the course. Three hours a week. *Three semester hours.*

PRINCIPLES OF HUMAN GEOGRAPHY G302

The purpose of this course is to develop an understanding of the relationships that exist between the natural and the cultural environments and the resultant effect upon man's activities. Three hours a week. *Three semester hours.*

REGIONAL GEOGRAPHY OF ANGLO-AMERICA G303

This course is a regional study of the physical, cultural, political, and economic environment of the peoples of Anglo-America. The study will stress relationships that exist between these regions and other important world areas. Three hours a week. *Three semester hours.*

REGIONAL GEOGRAPHY OF LATIN AMERICA G304

A regional study of Middle America and South America. Emphasis is upon the physical environment and the cultural, economic, and political conditions that exist and are in the process of development. Three hours a week. *Three semester hours.*

REGIONAL GEOGRAPHY OF EUROPE G305

The physical, cultural, political, and economic features of the European subcontinent are described in the first part of this course. Regional similarities and differences and Europe's place in the modern world will be analyzed in the latter part. Three hours a week. *Three semester hours.*

GEOGRAPHY OF THE MIDDLE EAST
AND NORTHERN AFRICA G308

This course will consider the cultural and physical characteristics of those countries extending from Mauritania-Morocco to Afghanistan. Emphasis will be placed on the historical development and Arabization of the region, strategic significance, and current socio-economic problems. Three hours a week. *Three semester hours.*

BIOGEOGRAPHY

G309

An ecological perspective of the environmental relationships of living organisms: their origin, distribution, evolution, adaptation and association. Three hours a week. *Three semester hours.*

GEOGRAPHY OF UNDERDEVELOPED NATIONS

G310

This course will classify and evaluate the physical and cultural resource potential of the world's underdeveloped nations. Three hours a week. *Three semester hours.*

REGIONAL GEOGRAPHY OF SOUTH AND EAST ASIA

G311

This course provides a survey of the physical, cultural, and economic origins of Asia. This background is then utilized to provide an understanding of the major social, economic and political problems facing this continent. Three hours a week. *Three semester hours.*

POPULATION GEOGRAPHY

G320

Prerequisites: G 302 or consent of the instructor. This course will aim at acquainting the student with the basic principles underlying the distribution of man in the world. The impact of economic, social and political factors on the density, composition, migration and other significant aspects of population will be studied. Its relationship with other social sciences will be examined. Three hours a week. *Three semester hours.*

GEOGRAPHY OF INTERNATIONAL TRADE

G321

Prerequisites: G 302 or consent of the instructor. With Boston's international trade as the starting point, the course will proceed into the analysis of the direction value and structure of the major exports and imports in the international markets. Emphasis will be placed on measuring and locating the magnitude of economic dependence of different countries upon their international trade and trade-partners. Three hours a week. *Three semester hours.*

GEOGRAPHY OF MANUFACTURING

G322

Prerequisites: G 302 or consent of the instructor. This course will concentrate on various criteria to evaluate the variety and magnitude of manufacturing industries. Emphasis will be placed on studying the industrial geography of Anglo-America specially and world generally. Three hours a week. *Three semester hours.*

POLITICAL GEOGRAPHY

G401

The influence of the geographic factors—physical and cultural—upon the development of states and their external relations. The geographic basis of power, internal and international tensions, and major writings in the field will be considered. Three hours a week. *Three semester hours.*

WORLD ECONOMIC GEOGRAPHY

G402

The relationships that exist between the physical environment and human activities. The geography of commerce, industry, agriculture, natural resources, and conservation will be presented by utilizing selected regions for study. Three hours a week. *Three semester hours.*

URBAN GEOGRAPHY

G403

A study of the influence of geographic factors in urban areas and distribution of economic activities within the urban complex. Problems of suburban growth and development, metropolitan problems and planning will also be discussed. Three hours a week. *Three semester hours.*

SEMINAR IN GEOGRAPHY

G404

Required for majors; A study of the philosophy and development of geographic thought and methodology. Three hours a week. *Three semester hours.*

CARTOGRAPHY

G405

The art and science of the presentation of earth patterns in the mediums of maps, models, cartograms and other cartographic devices. Laboratory exercises introducing basic projections, symbolism, handling of cartographic tools, lettering techniques, and fine drawing. Three hours a week. *Three semester hours.*

WEATHER AND CLIMATE G406

The elements of weather, temperature, pressure, and moisture will be studied in detail. Correct usage of weather equipment is involved in the course. After the study of weather, the knowledge is applied to climates of the world. Three hours a week. *Three semester hours.*

URBAN ECONOMIC LAND—USE G407

Prerequisites: G 402, G 403, or both. The theoretical aspect of the size and spacing of cities, their functional base, urban-industrial growth, internal structure, and the development of retail and industrial areas. Three hours a week. *Three semester hours.*

REGIONAL PLANNING AND DEVELOPMENT G410

Prerequisites: G 301 or G 406. This course will examine the geographical theories and problems involved in the spatial development of a region. Three hours a week. *Three semester hours.*

URBAN PLANNING G411

Prerequisite: G 403. The historical and contemporary practices in city planning and development of methodology and techniques for analysis of today's planning. Three hours a week. *Three semester hours.*

GEOGRAPHICAL METHODOLOGY G430

Prerequisites: G 301 and G 302. This course is designed principally to increase the student's awareness of the advancements being made in the fields of geographic investigation, formulation of problems, hypothesis, measurements and models. Three hours a week. *Three semester hours.*

SPECIAL TOPICS IN GEOGRAPHY G490

A course stressing research topics within the discipline of geography. Three hours a week. *Three semester hours.*

SEMINAR IN METROPOLITAN STUDIES I G492

The objectives of this course will be to define, evaluate and analyze, by an in-depth study problem areas within the Metropolitan Community. Utilization of the Metropolitan Studies Program Staff will provide an

interdisciplinary approach to selected problem areas; community leaders will serve as guest lecturers. Three hours a week. *Three semester hours.*

SEMINAR IN METROPOLITAN STUDIES II

G493

A continuation of G 492 Seminars in Metropolitan Studies I. Research papers pertaining to the student's area of interest, pertinent to selected problem areas, will be written under the direction of staff members in the Metropolitan Studies Program. Research papers will be presented and defended before the seminar students and faculty. Three hours a week. *Three semester hours.*

TOPICS IN GEOGRAPHY

G532

Required of History majors who are planning to teach in secondary schools. May also serve as an elective for other graduate students preparing to teach in secondary schools. This course considers the basic political, socio-economic, and demographic problems of historic and current interest to geographers. Problems will be considered within the geographic framework of their existence. Four hours a week, third quarter. *Two semester hours.*

Geology

Dr. James P. Jones, Chairman

A degree in earth science provides a basic program of studies allowing students to prepare for teaching careers while still being flexible enough to allow for graduate school acceptance in a variety of disciplines.

A major in earth science may be obtained by fulfilling the following requirements: GI 101, 102; GI 201, 202; P 301, 302 or Ch 101, 102; P 306; G 404; and G 406.

Elective courses are available for those students who may wish to concentrate in Geology or Oceanography.

A minor may be obtained by selecting 21 hours from the required or elective curriculum.

Students who intend to prepare for a graduate program are strongly advised to meet with an appropriate faculty member as early as possible.

PHYSICAL GEOLOGY

GL101

Introduction to the study of the earth, its composition, development, and destruction in relation to natural processes. Laboratory work includes investigation of rocks and minerals, geologic and topographic map analysis. Three lectures, two hours in laboratory a week. *Four semester hours.*

HISTORICAL GEOLOGY

GL102

Historical development of continents and ocean basins, development of life, classification of fossil animal and plants. Three lectures, two hours in laboratory a week. *Four semester hours.*

OCEANOGRAPHY I

GL201

Oceanography is a correlation of the geographical, geological, physical, chemical, and biological aspects of the sea. This course explores the historical, geological and physical aspects. Three hours a week. *Three semester hours.*

OCEANOGRAPHY II

GL202

The biological, geographical, and recreational aspects of the sea will be explored. The fertile areas of the sea, favorable conditions for life in the sea, plankton invertebrate life, life on the bottom, fishes, mammals, the economic importance of the fishing industry to Massachusetts, the recreational facilities, and the future uses of the sea will be discussed. Three hours a week. *Three semester hours.*

COASTAL GEOMORPHOLOGY

GL203

Prerequisite: GL 201. A course designed to teach the student the classification, processes, features, and mapping of coastlines. Emphasis will be placed on local shorelines. Three hours a week. *Three semester hours.*

COASTAL CLIMATOLOGY

GL204

Prerequisites: G 301 or G 406. This course will study the classification of climate, the ocean — atmosphere relationships, the specific effect of the ocean on the climate of Massachusetts, as well as local research topics. Three hours a week. *Three semester hours.*

GEOMORPHOLOGY

GL301

Prerequisites: Gl 101, 102 or consent of instructor. An indepth study will be made of the surface features of the earth. Structural and dynamic Geology will be discussed with emphasis placed on the New England geomorphology. Three hours a week. *Three semester hours.*

GEOLOGY OF NORTH AMERICA

GL303

Prerequisites Gl 101, Gl 301, or consent of the instructor. A general survey of each province of North America, including the geomorphology, structure, and human environment of each region. Three hours a week. *Three semester hours.*

MINERALOGY

GL305

Prerequisite: Gl 101. This course deals with concepts, descriptions and determinative procedures in Mineralogy. Basic concepts in crystallography, mineral classification, chemical mineralogy and specific rock-forming, mineral associations are presented. Two lectures, four hours in laboratory a week. *Four semester hours.*

PETROLOGY

GL307

Prerequisites: Gl 101, Gl 305. Familiarity with the characteristics of sedimentary, igneous and metamorphic rocks is the primary purpose of this course. The physical and chemical environment in which a rock is formed and exists will be examined so that the student may acquire a better understanding of the earth's history. Instruction in Petrologic Field procedures will be an integral part of the course. Two lectures, four hours in laboratory a week. *Four semester hours.*

History

Dr. Lauréat J. Bernard, Chairman

The department of History offers programs for major concentration for Secondary Education and for the A.B. and B.S. degrees in History. History majors are required to take H 101 - H 102 or one of its equivalents: H 103 - H 104, H 105 - H 106; H 201 - H 202, and a minimum of 24 elective hours in History. The department recommends that majors in History elect one of the historiography courses.

History minors are required to take H 101 - H 102 (or its equivalent), H 201 - H 202, and 9 elective hours in History. Graduate students may choose any History elective with the permission of the Dean of the Graduate School, Dr. Francis P. O'Hara.

The department of History participates in the Honors Program, and recommends to those properly certified, membership in the national historical society of Phi Alpha Theta — Mu Iota Chapter.

WESTERN CIVILIZATION I H101
Required of History majors. Selected topics in Western history before 1715. Each instructor's course outline and reading list will be available in the History department before registration. Three hours a week.
Three semester hours.

WESTERN CIVILIZATION II H102
Required of History majors. Selected topics in Western history since 1715. Each instructor's course outline and reading list will be available in the History department before registration. Three hours a week.
Three semester hours.

HISTORY OF IDEAS I H103
May be substituted for H 101 by Freshmen and majors. An analysis of several major works which helped shape the mind of the West before 1550. Each instructor's course outline and reading list will be available in the History department before registration. Three hours a week.
Three semester hours.

HISTORY OF IDEAS II H104
Required of Freshmen who elect H 103. An analysis of several major works which have helped shape the mind of the West since 1550. Each instructor's course outline and reading list will be available in the History department before registration. Three hours a week. *Three semester hours.*

WORLD HISTORY I H105
Required of Freshmen and majors who do not elect H 101 or H 103. Selected topics in the early history of Africa, Asia, and Europe. Each

instructor's course outline and reading list will be available in the History department before registration. Three hours a week. *Three semester hours.*

WORLD HISTORY II H106

Required of Freshmen who elect H105. Selected topics in the history of modern Africa, Asia, and Europe. Each instructor's course outline and reading list will be available in the History department before registration. Three hours a week. *Three semester hours.*

SURVEY OF ANCIENT CIVILIZATION TO 600 B.C. H107

Civilization's birth and progress in Mesopotamia, Egypt, Canaan, Minoan Crete, Homeric Greece, emphasizing the role of cities. Social, intellectual life seen through literary, religious sources. Extensive slides stressing art, archaeological digs. Three hours a week. *Three semester hours.*

AMERICAN HISTORY TO 1877 H201

Required of History majors. Selected topics in the history of the United States before 1877. Each instructor's course outline and reading list will be available in the History department before registration. Three hours a week. *Three semester hours.*

AMERICAN HISTORY SINCE 1877 H202

Required of History majors. Selected topics in the history of the United States since 1877. Each instructor's course outline and reading list will be available in the History department before registration. Three hours a week. *Three semester hours.*

HISTORY OF ENGLAND TO 1689 H203

The Anglo-Saxon period; the Anglo-Norman fusion; the development of law and parliament; the rise of the Tudors; 17th century monarchy and revolutions. Three hours a week. *Three semester hours.*

HISTORY OF ENGLAND FROM 1689 H204

The late Stuart and Georgian politics; the industrial revolution; the rise of British empire; 19th century conservative and liberal politics and ideas; social, imperial, and intellectual change to 1939. Three hours a week. *Three semester hours.*

HISTORY OF LATIN AMERICA TO 1825 H205

Main focus on the aboriginal American and Spanish background, the conquest and development of colonial Spanish America, with emphasis on social and intellectual growth. Three hours a week. *Three semester hours.*

HISTORY OF LATIN AMERICA SINCE 1825 H206

A study of the emerging nations of Latin America after independence: the growth of dictatorships, of Indianism, the social and intellectual forces shaping present-day Latin America, especially Argentina, Brazil, Mexico and Peru. Three hours a week. *Three semester hours.*

AMERICAN COLONIAL HISTORY H207

The interrelationships between Europe and British North America from discovery to 1763, and the development of the early American economy, society, and institutions. Three hours a week. *Three semester hours.*

AMERICAN REVOLUTION AND CONSTITUTION H208

Analyzing the break up of the British colonial system, this course describes the Revolution and the creation of a new nation and federal government, 1763-1790. Three hours a week. *Three semester hours.*

THE FEDERALIST ERA: 1790-1815 H209

Centers about the formative years under the United States Constitution, with emphasis on policies encouraged by Hamilton and the early political parties of the Federalists and the Republicans. Three hours a week. *Three semester hours.*

THE RENAISSANCE AND THE REFORMATION H210

The political, literary, and artistic phases of the Renaissance and an

examination of the religious aspects of the Reformation. Three hours a week. *Three semester hours.*

THE EIGHTEENTH CENTURY H211

This course is concerned with the 18th Century's attempt to understand man and his struggle to achieve happiness. Emphasis is placed on ideas, and the historical events of the times related to them. Three hours a week. *Three semester hours.*

THE FRENCH REVOLUTION AND NAPOLEON H212

Analysis of the principles, causes, and phases of the French Revolution and the era of the Directory and Napoleonic rule. Three hours a week. *Three semester hours.*

THE SEVENTEENTH CENTURY H213

Selected topics concerned with the question of the 17th Century as the first modern era. Topics include: Absolutism in France vs. Constitutionalism in England; The Scientific Revolution and Its Social and Intellectual Consequences; The Emergence of the Bourgeoisie. Three hours a week. *Three semester hours.*

HISTORY OF MODERN GERMANY H214

An in depth study of major events and developments in Germany from 1815 to the present. Three hours a week. *Three semester hours.*

THE EARLY MIDDLE AGES H215

A study of the Mediterranean world and northern Europe, focusing on the problem of transition from Rome to the Middle Ages and the successors to Rome: the Byzantine, Moslem, and Carolingian Empires; c 200 A.D. — 1000. Three hours a week. *Three semester hours.*

THE HIGH MIDDLE AGES H216

A study of Western Europe, c 1000-1450, focusing on feudal society; the medieval political, economic, and cultural Renaissance; and the problem of the decline of the Middle Ages. Three hours a week. *Three semester hours.*

- FRANCE SINCE 1815 H217
 France from the post-Napoleonic period to 1940, with emphasis upon the various regimes of the Nineteenth Century and the rise and fall of the Third Republic. Three hours a week. *Three semester hours.*
- HISTORY OF EASTERN EUROPE SINCE 1815 H218
 This course will concentrate on the political, social, and economic developments in the Austro-Hungarian Empire and the Balkans. Three hours a week. *Three semester hours.*
- BLACK AMERICAN HISTORY TO 1890 H219
 The role of Afro-Americans in the development of American life from 1619 to 1890. Three hours a week. *Three semester hours.*
- HISTORIOGRAPHY H220a
 An analysis of Historical research and methodology and a study of past and present American historians. Three hours a week. *Three semester hours.*
- HISTORIOGRAPHY H220e
 A study of ancient and modern European historians and analysis of historical research methods. Three hours a week. *Three semester hours.*
- HISTORY OF MODERN ITALY H221
 A course emphasizing Italian Nationalism, unification, growth of democracy, fascism, and current social and political developments three hours a week. *Three semester hours.*
- MODERN BRITAIN H222
 Social and political crisis before 1914; the Home Front in War; post-war experiments in Labour and Conservative politics; the depression; Chamberlain and Hitler; World War II. Three hours a week. *Three semester hours.*
- HISTORY OF MODERN IRELAND H223
 Political, social, religious, and economic developments in Ireland from

the Act of Union (1800) to her emergence as an independent nation. Three hours a week. *Three semester hours.*

BLACK AMERICAN HISTORY SINCE 1890 H224

A continuation of H219 stressing: Legal Separation, B.T. Washington vs. W.E.B. DuBois, Organized Protests, Desegregation, the Civil Rights Movement, Black Militancy and Black Liberation. Three hours a week. *Three semester hours.*

EUROPE IN THE NINETEENTH CENTURY H301

An introduction to the economic, social, and political forces vital to this century, with a study of the national histories prominent then. Three hours a week. *Three semester hours.*

EUROPE IN THE TWENTIETH CENTURY H302

An analysis of the political, social, economic, and cultural aspects of Twentieth-Century Europe. Three hours a week. *Three semester hours.*

POPULISM AND THE PROGRESSIVE ERA H303

An intensive probe into the development of the American Commonwealth from 1877 to 1920. Three hours a week. *Three semester hours.*

UNITED STATES IN THE TWENTIETH CENTURY H304

Prerequisite: H202. A description and analysis of major events and forces in American history from the Progressive Era through World War II. Special emphasis on social and political themes and on recent historical interpretations. Three hours a week. *Three semester hours.*

HISTORY OF EARLY RUSSIA H305

Russian history from the Kievan and Mongolian periods through the Appanage Age and the rise of Imperial Czardom. Three hours a week. *Three semester hours.*

HISTORY OF MODERN RUSSIA H306

This survey traces the rise and decline of the monarchy since Peter the Great, Russia's external expansion and the revolutions of 1905 and 1917. Three hours a week. *Three semester hours.*

- HISTORY OF GREECE H307
This course covers the history of Greece from the Twelfth Century B.C. to the Roman occupation. Three hours a week. *Three semester hours.*
- SURVEY OF ROMAN CIVILIZATION H308
Roman social, intellectual life in the context of historical events from the city's origins to the Late Empire. Extensive slides emphasizing art, architecture, archaeological field work. Three hours a week. *Three semester hours.*
- NATIONALISM AND SECTIONALISM
IN AMERICA: 1816-1850 H309
A study of the significant trends facing young America from the War of 1812 to the eve of the Civil War, with emphasis on the domestic scene. Three hours a week. *Three semester hours.*
- CIVIL WAR AND RECONSTRUCTION: 1853-1877 H310
The great upheaval in mid-century America: causes, the agony of war, and the legacy of division between sections and races. Three hours a week. *Three semester hours.*
- THE WESTWARD MOVEMENT: 1763-1890 H312
The growth and development of the West, the treatment of American Indians, and the influence of the frontier on the political, cultural, and economic life. Three hours a week. *Three semester hours.*
- HISTORY OF THE OLD SOUTH H313
Analysis of the characteristics of a distinctive Southern society, its politics, economy, and culture, from settlement to secession. Three hours a week. *Three semester hours.*
- HISTORY OF AFRICA TO 1850 H314
Origin of Man in East Africa. Development of African Civilization, with emphasis on the Empires of Egypt, Axum, Kush, Ghana, Mali, Songhai, Lunda-Luba, and Zimbabwe. African trade contracts with Asia, Europe, North America. Three hours a week. *Three semester hours.*

- MODERN EUROPEAN IMPERIALISM H315
The motives and methods of European Imperialism, and selected resistance movements in Africa and India: 1850 to 1950. Three hours a week. *Three semester hours.*
- HISTORY OF THE NEW SOUTH H316
Covers the nature of Southern society, problems, behavior; and its history from Reconstruction to the present, stressing Southern alienation from and re-integration into American society. Three hours a week. *Three semester hours.*
- HISTORY OF CANADA H317
The political, social, economic, and cultural factors from early French and colonial settlements to the present. Three hours a week. *Three semester hours.*
- HISTORY OF THE AMERICAN CITY H318
Historical study of American cities since colonial times with emphasis on current problems. Consideration of the connection of cities with industrialization, technology, education, population change, community planning, culture, transportation, and government. Three hours a week. *Three semester hours.*
- HISTORY OF THE MODERN NEAR EAST H319
A survey from 1815 to the present, traces the decline of the Ottoman Empire, rise of Nationalism, and the Arab-Israeli conflict. Three hours a week. *Three semester hours.*
- AFRICA SINCE 1850 H320
A continental survey of Africa from 1850 to 1938. African states before European takeover. European expansion and conquest. The colonial period. African reactions to colonialism. Three hours a week. *Three semester hours.*
- HISTORY OF AMERICAN LABOR H321
A historical survey of labor and its place in American life from colonial times to the present. Major emphasis on the founding, history,

development and place of labor unions in American history. Three hours a week. *Three semester hours.*

EUROPEAN INTELLECTUAL HISTORY: 1600-1815 H401
A study of the scientific, political, and ideological beliefs of the Seventeenth and Eighteenth centuries, with particular consideration of the seminal minds and their ideas. Three hours a week. *Three semester hours.*

EUROPEAN INTELLECTUAL HISTORY SINCE 1815 H402
Among the topics evaluated are romanticism, conservatism, liberal democracy, socialism, Marxism, Darwinism, Irrationalism, Freudianism, Existentialism, Totalitarianism, and the dilemmas of contemporary Europe. Three hours a week. *Three semester hours.*

SOCIAL AND CULTURAL HISTORY OF
THE UNITED STATES TO 1870 H405
The development of American thought and society with emphasis on the impact of Puritanism, Individualism, and Transcendentalism on the American scene. Three hours a week. *Three semester hours.*

SOCIAL AND CULTURAL HISTORY OF THE
UNITED STATES SINCE 1870 H406
A study of the transition of the United States to an urban, industrialized society, and the effect on the social, cultural, and intellectual life of the people. Three hours a week. *Three semester hours.*

THE CONTEMPORARY FAR EAST H407
This course will focus on the transformation of China and Japan since 1800, and its impact upon Korea and Southeast Asia. Three hours a week. *Three semester hours.*

EARLY EAST ASIAN CIVILIZATION H408
A study of the social, cultural, political, and economic institutions of Traditional China and Japan and concurrent developments in Korea and Southeast Asia. Three hours a week. *Three semester hours.*

HISTORY OF CONTEMPORARY EUROPE SINCE 1939 H410

The current national developments in Western Europe will be studied after a brief analysis of World War II. Special attention to be given to the social, economic, and cultural trends of recent origin. Three hours a week. *Three semester hours.*

SEMINAR IN SELECTED TOPICS H490

Required of all honors' candidates during the second semester of the Junior year. Open to others with permission of the Instructor. Three hours a week. *Three semester hours.*

DIPLOMATIC HISTORY OF THE UNITED STATES I H501

Required of graduate students majoring in History. Undergraduates admitted with permission of the Instructor. Analyzes the main forces that have shaped the early development of American foreign policy from 1777 to 1898. Three hours a week. *Three semester hours.*

DIPLOMATIC HISTORY OF THE UNITED STATES II H502

Required of graduate students majoring in History. Prerequisite for undergraduates, H501. (Undergraduates will receive three semester hours credit and attend classes throughout the fourth quarter). A study of American foreign relations during the 20th century. Graduates will cover the period 1898-1945. Four hours a week, third quarter. *Two or three semester hours.*

HISTORY OF ENGLAND FROM 1485 H531

Required of graduate students majoring in English. A survey of English history starting with the Tudor Renaissance, with special emphasis placed on political and social growth as they applied to English literature. Four hours a week, third quarter. *Two semester hours*

AN INTRODUCTION TO THE STRUCTURE AND THE PROCESS
OF THE SOCIAL SCIENCES AND HISTORY H532

This course invites students to investigate the meaning of Structure and Process in the Social Science Disciplines and the implications of this for Secondary classroom. Four hours a week, third quarter. *Two semester hours.*

LATIN AMERICAN STUDIES

The Latin American Studies program is an interdisciplinary major leading to the A.B. degree. Students may choose courses in Spanish, History, Geography and related courses in Political Science, Economics and Sociology. Thirty hours of interdepartmental course work are required for a major in the program. A reading knowledge of Spanish is desirable for the major.

Those interested in program should consult with one of the members of the Latin American Studies Committee: Dr. Yvonne Barrett, Foreign Languages, Dr. Michael Mensoian, Geography, Dr. Dorothy Scanlon, History.

Law Enforcement Program

Dr. James P. Jones, Chairman

The Law Enforcement Program is designed to meet the educational needs of today's police personnel in a dynamically changing society. The emphasis rests on the social sciences and is an inter-departmental program. The core requirements are Le 101 Introduction to Law Enforcement, Ch 311 Criminalistics and G 403 Urban Geography. In addition to the core requirements, the student majoring in the Law Enforcement Program must elect 21 semester hours in the social sciences. The minor will constitute the core requirements and an additional 9 semester hours in the social sciences.

INTRODUCTION TO LAW ENFORCEMENT

LE101

This course is designed to acquaint the student with the historical and philosophical background to law enforcement in the United States, the various agencies established to regulate criminal and non-criminal activities of the citizens, and recent trends. Three hours a week. *Three semester hours.*

CRIMINAL LAW

LE102

This course introduces the student to the basics of criminal law, its development, past and present elements of crimes, the law of arrest and constitutional limitations on evidence. Three hours a week. *Three semester hours.*

Mathematics

Dr. William E. Perrault, Chairman

The department of mathematics offers programs of study leading to the degrees A.B., B.S., A.B. in Secondary Education, B.S. in Secondary Education, and M.Ed. The training offered contributes to the preparation of students for a wide variety of careers including the professions of Secondary-school mathematics teaching, actuarial mathematics, computer science, creative research, and industrial technology.

To aid in describing the requirements for a major or minor in mathematics, the set of course numbers has been partitioned into six groups which are listed following the next few paragraphs.

To graduate as a mathematics major a student must accumulate a minimum of 36 hours in mathematics to be distributed as follows: all 15 hours of Group I, 9 hours of Group II at most 3 of which may be in geometry, 12 hours of Group III not completed in Group II. Every mathematics major ideally should have an advisor throughout his college career. In any case, upon completing Group I a student should:

- a) preferably not have earned a grade of less than 2 in M 207 and
- b) have his mathematics program reviewed by the department.

To graduate as a mathematics minor a student must accumulate 21 hours in mathematics by choosing courses from Groups I through IV. However, an elementary major desiring a minor in mathematics may elect courses from Group V as well.

Students whose curricula emphasize theory, applications, or teaching may graduate with honors by presenting in M 490 a paper representing independent work in a topic not covered in formal course work. If the student gives three typed copies of this paper by May 1 to the chairman of the mathematics honors program committee and if his work is approved by his advisor and the chairman of the committee, then the department shows its recognition of such extra work by bestowing a diploma and the student is mentioned as graduating with honors at graduation exercises.

Prospective actuarial candidates for the life insurance industry are advised to take the following courses: M 312, M 402, M 403, M 404, and M 405.

Prospective elementary school teachers who have completed four years of college preparatory mathematics in high school may satisfy the Level II requirements proposed by the Committee on the Undergraduate Program in Mathematics (CUPM) by taking the following courses: M 103, M 107 - M 108 (or M 109 - M 110), M 306, M 307, and M 406. Level II is related to mathematics specialists in the upper elementary schools.

The mathematics courses are grouped (with the letter M omitted) as follows:

Group I: 103, 107, 108, 207

Group II: 306, 307, 308, 406, 407

Group III: 111, 112, 208, 306, 307, 308, 309, 310, 311, 312, 335, 401, 402, 403, 404, 405, 407, 409, 410, 411, 412, 413, 415, 416, 440, 441, 490.

Group IV: 102, 109, 110

Group V: 224, 225, 226, 227

Group VI: 101, 305, 316, 326

FUNDAMENTAL PRINCIPLES OF MATHEMATICS I M101

This course is offered for non-mathematics and non-science majors. Topics included are: sets, logic, introduction to the real number system, and applications. Three hours a week. *Three semester hours.*

FUNDAMENTAL PRINCIPLES OF MATHEMATICS II M102

Prerequisite: M 101. This course is offered for non-mathematics and non-science majors. This course includes topics from some of the following areas: analytic geometry, number theory, probability theory, algebra, and computer science. Three hours a week. *Three semester hours.*

AN INTRODUCTION TO MODERN MATHEMATICS M103

This course includes sets, logic, special functions, and polynomials. Three hours a week. *Three semester hours.*

CALCULUS I M107

Prerequisite: M 103 or equivalent. This course covers limits, continuity,

differentiation, and applications of the derivative. Four hours a week. *Four semester hours.*

CALCULUS II M108

Prerequisite: M107. This course covers the concept of area and integral, reviews analytic geometry, and treats the calculus of transcendental and trigonometric functions. Four hours a week. *Four semester hours.*

MATHEMATICAL ANALYSIS I M109

This course serves as an introduction to the basic ideas of calculus and probability theory with emphasis on understanding mathematical concepts and applications of them. Three hours a week. *Three semester hours.*

MATHEMATICAL ANALYSIS II M110

Prerequisite: M 109. This course includes the definite integral, fundamental theorem of calculus, methods of integration, applications, continuous and discrete probability. Three hours a week. *Three semester hours.*

INTRODUCTION TO COMPUTER SCIENCE I M111

This course is designed to acquaint the student with the scope and power of high speed digital computer and with the techniques by which its potential can be realized. Four hours a week. *Three semester hours.*

INTRODUCTION TO COMPUTER SCIENCE II M112

This course is designed to impart a basic understanding of computer character and capabilities. It will do this through a study of machine and assembly language. Emphasis is on the mathematical considerations involved in design and operation of computers. Four hours a week. *Three semester hours.*

CALCULUS III M207

Prerequisite: M 108. This course includes the study of parametric equations, polar coordinates, methods and applications of integration, vectors in the plane and some solid analytic geometry. Four hours a week. *Four semester hours.*

CALCULUS IV

M208

Prerequisite: M 207. This course studies vectors in three dimensions and continues the discussion of solid analytic geometry; also included are: L'Hospital rule, sequences, series, partial differentiation and multiple integrals. Four hours a week. *Four semester hours.*

THE STRUCTURE OF NUMBER SYSTEMS I

M224

Elective for students in the Elementary curricula. This course includes logic, elementary set theory, numeration, and the construction and properties of whole numbers. Three hours a week. *Three semester hours.*

THE STRUCTURE OF NUMBER SYSTEMS II

M225

Prerequisite: M 224. This course includes an analysis of the construction of rational numbers and real numbers. Elementary number theory and modular number systems are included. Three hours a week. *Three semester hours.*

INTUITIVE GEOMETRY

M226

Elective for students in the Elementary curricula. This course includes the study of space, planes, lines, and figures as sets of points with their properties developed intuitively. Coordinate geometry and the basic concepts of measurement are also included. Three hours a week. *Three semester hours.*

ELEMENTS OF ALGEBRA

M227

Prerequisite: M 305 or M 225. Elective for students in the Elementary curricula. This course is concerned with the basic ideas and structure of algebra and incorporates some experimental work to accomplish this end. Three hours a week. *Three semester hours.*

BASIC MODERN MATHEMATICS

M305

Required for juniors electing the Elementary or Kindergarten-Primary curricula unless M 224 is taken. This course includes: numeration systems, set operations, arithmetic algorithms, fractions, percent, simple informal geometry and trigonometry. Three hours a week. *Three semester hours.*

FUNDAMENTAL CONCEPTS OF GEOMETRY

M306

Prerequisite: M 107. This course is a study in depth of the foundations of that geometry customarily offered in high schools. In particular, it treats the basic properties of absolute, Euclidean, and hyperbolic geometries. Three hours a week. *Three semester hours.*

PROBABILITY

M307

Prerequisite: M 108. The course includes properties of the probability set function, conditional probability, independence, stochastic processes, distributions and expectations of random variables, and limiting distributions. Three hours a week. *Three semester hours.*

HIGHER GEOMETRIES

M308

Prerequisite: M 107. This course is a study of the properties of projective geometries and subgeometries. The course is developed using synthetic methods and expanded through analytic techniques. Three hours a week. *Three semester hours.*

HISTORY OF MATHEMATICS

M309

Prerequisite: M 107. This course surveys the history of elementary mathematics, through calculus, from ancient times to the present. Emphasis is on the major developments in the fields of arithmetic, algebra, and geometry, and on contributions of noteworthy mathematicians and epochs. Three hours a week. *Three semester hours.*

INTRODUCTION TO NUMBER THEORY

M310

Prerequisite: M 107. This course includes elementary properties of integers, the Euclidean algorithm, divisibility, congruences and diophantine equations, and number-theoretic functions. Three hours a week. *Three semester hours.*

SET THEORY AND LOGIC

M311

Prerequisite: M 108. This course studies set theory and logic in depth. Three hours a week. *Three semester hours.*

NUMERICAL ANALYSIS

M312

Prerequisite: M 108. This course includes finding roots of functions, numerical differentiation, numerical integration, and numerical solutions of ordinary differential equations. Three hours a week. *Three semester hours.*

METHODS OF TEACHING MATHEMATICS IN THE KINDERGARTEN-PRIMARY SCHOOL

M316

Prerequisite: M 225 or M 305. Required of juniors in the Kindergarten-Primary curricula. This course considers the research, methods, and materials of instruction appropriate to the teaching of mathematics in grades kindergarten through three. Two hours a week. *Two semester hours.*

METHODS OF TEACHING MATHEMATICS IN THE ELEMENTARY SCHOOL

M326

Prerequisite: M 225 or M 305. Required of juniors in the Elementary curricula. This course considers the research, methods, and materials of instruction appropriate to the teaching of mathematics in grades one through six. Two hours a week. *Two semester hours.*

MATHEMATICS FOR SECONDARY SCHOOL TEACHERS

M335

This course concentrates on those aspects of mathematics that are fundamental to a basic understanding and effective teaching of secondary school mathematics. Three hours a week. *Three semester hours.*

MATHEMATICAL DISCOVERY

M401

Prerequisite: M 108. This course analyzes generally the ways and means of discovery of problem solutions and also aims at improvement in the teaching of problem solving. Three hours a week. *Three semester hours.*

MATHEMATICAL STATISTICS I

M402

Prerequisite: M 307. This course is a broad introduction to classical large-sample methods. Topics covered are probability, frequency

distributions, sampling theory, hypothesis testing and estimation, correlation and regression. Three hours a week. *Three semester hours.*

MATHEMATICAL STATISTICS II M403

Prerequisite: M 402. This course includes limiting distributions, small sample distributions, distribution-free statistical inference, statistical hypotheses, analysis of variance, and multi-variate distributions. Three hours a week. *Three semester hours.*

MATHEMATICS OF FINANCE M404

Prerequisite: M 107. This course considers the application of algebra to interest, annuities, bonds, investments and life insurance. Three hours a week. *Three semester hours.*

MATHEMATICS OF LIFE INSURANCE M405

Prerequisite: M 404. This course includes mathematical theory of life contingencies, mortality tables, annuities, net premiums, reserves, non-forfeiture benefits, and gross premiums. Three hours a week. *Three semester hours.*

ABSTRACT ALGEBRA I M406

Prerequisite: M 107. This course introduces algebraic structures, emphasizing groups, rings, domains, and fields. Three hours a week. *Three semester hours.*

ABSTRACT ALBEGRA II M407

Prerequisite: M 406. This course continues M 406, emphasizing vector spaces, linear transformations, and matrices. Three hours a week. *Three semester hours.*

DIFFERENTIAL EQUATIONS I M409

Prerequisite: M 108. This course familiarizes the student with first and second order differential equations, linear differential equation with constant coefficients, singular solutions, and physical applications. Three hours a week. *Three semester hours.*

TOPOLOGY

M410

Prerequisite: M 411. This course gears point-set topology to the undergraduate including such topics as topologies, continuity, connectivity, compactness, separation axioms, and metric spaces. Three hours a week. *Three semester hours.*

REAL ANALYSIS I

M411

Prerequisite: M 207. This course includes relations, functions, sequences, series, elements of metric topology, and the properties of monotone and continuous real-valued functions of a real variable. Three hours a week. *Three semester hours.*

REAL ANALYSIS II

M412

Prerequisite: M 411. This course includes the Riemann and Riemann-Stieltjes integrals, elements of measure theory, and the Lebesgue integral. Three hours a week. *Three semester hours.*

INTRODUCTION TO MATHEMATICAL PHYSICS

M413

Prerequisite: M 409. This course introduces curvilinear coordinates by means of tensors of second rank, transformations, vector and scalar fields, while making use of several advanced mathematical techniques that could be applied in Physics. Three hours a week. *Three semester hours.*

COMPLEX ANALYSIS

M415

Prerequisite: M 411. This course includes complex numbers, holomorphic functions, contour integrals, and complex series. Three hours a week. *Three semester hours.*

ADVANCED CALCULUS I

M416

Prerequisite: M 207, M 409. This course familiarizes the student with functions of several variables, inverse and implicit functions, curves and surfaces, line and surface integrals, orthogonal functions, and Fourier analysis. Three hours a week. *Three semester hours.*

TOPICS IN ABSTRACT MATHEMATICS

M440

Prerequisite: M 207. This course provides an opportunity to remedy

deficiencies in the students theoretical background and is preparation via independent study for M 490. Three hours a week. *Three semester hours.*

TOPICS IN APPLIED MATHEMATICS M441

Prerequisite: M 207. This course gives the opportunity to study applications of mathematics not available in other courses and is preparation via independent study for M 490. Three hours a week. *Three semester hours.*

SPECIAL TOPICS IN MATHEMATICS M490

Prerequisite: M 440, M 441 or permission of the Mathematics Honors Committee. Required for Seniors in the Honors Program. This course requires each student to do independent work in a topic not covered in formal course work. Three hours a week. *Three semester hours.*

FUNDAMENTAL CONCEPTS OF GEOMETRY M501

Prerequisite: M 407. Elective for Graduate students. This course is a detailed study of the projective group and its principal subgroups (affine, Euclidean, hyperbolic, elliptic) from an algebraic standpoint. Three hours a week. *Three semester hours.*

PROBABILITY AND STATISTICAL INFERENCE M504

Prerequisite: M 411. Elective for Graduate students. The course concerns itself with the foundations of probability from a measure theoretical standpoint. Also included are elements of decision and game theory. Four hours a week, third quarter. *Two semester hours.*

A SURVEY OF ALGEBRA AND NUMBER THEORY M542

Elective for Graduate students. The course includes sets, formal properties and construction of number systems, groups, rings, fields and vector spaces. Four hours a week, third quarter. *Two semester hours.*

METHODS OF TEACHING MATHEMATICS
IN THE SECONDARY SCHOOL ED336M

Prerequisite: Ed 333. This course develops the essentials and refine-

ments of lesson planning and effective teaching of secondary school mathematics through classroom experiences at the laboratory school and related seminar sessions. Four hours a week. *Three semester hours.*

STUDENT TEACHING AND SEMINAR

ED430

Prerequisite: Ed 336M. This is a laboratory course of 8 weeks duration providing full-time student teaching experiences in public secondary schools under the guidance of a regular classroom cooperating teacher. *Seven semester hours.*

Metropolitan Studies

Dr. James P. Jones, Chairman

This area of concentration, as designed, proposes an inter-disciplinary academic approach within the Social Studies framework. This program has been developed primarily for those students seeking the A.B. and B.S. non-teaching degrees.

The major is composed of 36 semester hours equally divided between the academic areas of geography, economics, sociology and political science.

The minor will constitute a concentration of 18 semester hours within one major academic department.

Music

Dr. Elizabeth A. O'Brien, Chairman

The program in Music is designed to develop the student's aesthetic nature through a program of theoretical and listening courses which are open to all students. Two courses are required for education majors, Ms 411 for those preparing to teach at the Kindergarten-Primary level or Ms 422 for those preparing to teach at the elementary level.

A minor in music may be developed by a student with an

instrumental background by acquiring 18 semester hours in music.

Participation in one of the musical organizations is required of those pursuing a minor in music.

MUSIC IA MS101

Elective. No prerequisite. Fundamentals of music theory; analysis; ear training and sight singing; and vocal music. Three hours a week. *Three semester hours.*

MUSIC IB MS102

Elective. Prerequisite: Ms 101. This course continues the work of Music IA and also includes a study of elementary harmony. Three hours a week. *Three semester hours.*

APPRECIATION OF MUSIC MS201

No prerequisite. Open to all students. A general survey of the history and literature of music. Form, orchestration and stylistic features are studied. Assigned readings. Three hours a week. *Three semester hours.*

MUSIC IIA MS203

Elective. Prerequisite: Ms 102. More advanced work in harmony, analysis, ear training and sight singing, and choral singing. Three hours a week. *Three semester hours.*

MUSIC IIB MS204

Elective. Prerequisite: Ms 203. This course develops further the work of Ms 203 and also includes the study of seventh chords and modulation. Three hours a week. *Three semester hours.*

BASIC STUDIES IN MUSIC MS205

Open to all students. No prerequisite. Selected works will be heard and analyzed from various approaches. Three hours a week. *Three semester hours.*

MUSIC IIIA MS301

Elective. Prerequisites: Ms 203-204. More advanced work in harmony,

analysis, ear training and sight singing, and choral singing. Three hours a week. *Three semester hours.*

MUSIC IIIB

MS302

Elective. Prerequisite: Ms 301. The course continues the work of Music IIIA and includes the study of chords of the dominant ninth, eleventh and thirteenth, the Neapolitan sixth and the chords of the augmented sixth. Three hours a week. *Three semester hours.*

MASTERPIECES OF MUSIC

MS333

Prerequisite: Ms 201 or Ms 205. Recognized musical masterworks from the Renaissance to the Modern Period will be studied through listening. Three hours a week. *Three semester hours.*

OPERA

MS334

Prerequisite: Ms 201 or Ms 205. A survey of opera from the time of the Camerata to the present. Three hours a week. *Three semester hours.*

AMERICAN MUSIC

MS335

Prerequisite: Ms 201 or Ms 205. Developments in the history of American Music from the time of the New England hymnodists to the present, including jazz and show music. Three hours a week. *Three semester hours.*

MUSIC OF THE BAROQUE PERIOD

MS337

Prerequisite: Ms 201 or Ms 205. The styles, forms and techniques of the period from 1600 to 1750. Three hours a week. *Three semester hours.*

MUSIC OF THE TWENTIETH CENTURY

MS340

Prerequisite: Ms 201 or Ms 205. Trends in contemporary music and their relationship to social and political trends in this century. Three hours a week. *Three semester hours.*

RUSSIAN MUSIC

MS341

Prerequisite: Ms 201 or Ms 205. Music from the time of Catherine the Great to the present will be studied. Three hours a week. *Three semester hours.*

MUSIC IV

MS402

Elective. Prerequisite: Ms 302. Advanced work in the use of harmonic materials. Three hours a week. *Three semester hours.*

MUSIC, KINDERGARTEN-PRIMARY

MS411

Required of Seniors who have elected the Kindergarten-Primary Curriculum. A study of materials and methods suitable for use at this level. Three hours a week. *Three semester hours.*

MUSIC, ELEMENTARY SCHOOL

MS422

Required of Seniors who have elected the Elementary Curriculum. A study of materials and methods suitable for use in the elementary grades. Three hours a week. *Three semester hours.*

CLASS PIANO

MS435

Elective available to all students. No Prerequisite. A practical group approach to the piano, in which music fundamentals, reading piano music, learning to harmonize and accompany melodies, transposition and improvisation develop essential keyboard skills. This course is strongly recommended for Kindergarten-Primary majors for two or more semesters. Three hours a week. *Three semester hours.*

CHOIR

MS441

Open to all who enjoy singing. Prerequisite: permission of the instructor. The study and performance of choral literature from the Renaissance to the Contemporary Period. Performance at college functions and the presentation of concerts. Two hours a week. *One semester hour.* Maximum-7 credits.

BAND

MS442

Prerequisite: permission of the instructor. Study of standard band and wind ensemble repertoire; rehearsal techniques; preparation and presentation of concerts. Performs during basketball and hockey season at home and away games. Two hours a week. *One semester hour.* Maximum-7 credits.

Philosophy

John J. O'Neill, *Chairman*

The Department of Philosophy offers courses to all interested candidates for the A.B. and B.S. degrees and a program leading to a major or a minor study in philosophy.

The major in philosophy requires a student to complete a minimum of 30 semester hours in philosophy which must include Greek Philosophy (Ph 201), two of three history of philosophy courses from Ph 202, 204, 205, Logic (Ph 203), Ethics (Ph 301), and the course in Kant (Ph 320).

The minor in philosophy requires a student to complete a minimum of 18 semester hours in philosophy which must include a course in Greek philosophy (Ph 201), and either Logic (Ph 203) or Ethics (Ph 301).

All major programs should be planned in consultation with the department chairman and the program assistants.

Major students are encouraged to do directed reading in philosophy under the direction of each course instructor and to take an active part in the Philosophy Club at the College and to attend many of the weekly evening programs and lectures in philosophy given at neighboring universities and colleges. Advance notices are on the philosophy bulletin board.

An honors program in philosophy is available. Interested candidates should apply to the department Chairman.

PROBLEMS OF PHILOSOPHY

PH101

An introductory course. Its aim is to acquaint the student with the philosophic method, the problems and issues of philosophy and the great philosophers. Three hours a week. *Three semester hours.*

PHILOSOPHY OF MAN

PH102

Man is studied as a rational and social being with supremacy of intellect and anarchy of feeling. Modern images of man and the traditional great philosophies of life will be studied. Three hours a week. *Three semester hours.*

- GREEK PHILOSOPHY PH201
This course concentrates on selected philosophers from the Pre-Socratics through Aristotle. Required for major and minor study. Three hours a week. *Three semester hours.*
- CONTINENTAL RATIONALISTS PH202
Prerequisite: Ph 201. A study of the Continental Rationalists from Descartes to Spinoza. Three hours a week. *Three semester hours.*
- LOGIC PH203
This course studies principles of Rhetoric and Logic. Required for major study. Three hours a week. *Three semester hours.*
- MEDIEVAL PHILOSOPHY PH204
Prerequisite: Ph 201. A study of philosophers and problems of philosophy from St. Augustine to the Fourteenth Century. Offered every second year. Three hours a week. *Three semester hours.*
- BRITISH EMPIRICISTS PH205
A study of Hobbes, Locke, Berkeley, Hume. Three hours a week. *Three semester hours.*
- 19th CENTURY PHILOSOPHY PH207
A study of the major philosophers from Hegel to Bergson. Offered every second year. Three hours a week. *Three semester hours.*
- SYMBOLIC LOGIC PH210
Prerequisite: Ph 203. This course examines the logic of sentences, axiomatic systems, natural deduction and problems dealing with logical systems. Offered every second year. Three hours a week. *Three semester hours.*
- ETHICS PH301
This course studies the development of ethics from the ancient Greek, Roman, and Medieval, to Modern periods including Positivism, Marxism, and Existentialism. Required for major study. Three hours a week. *Three semester hours.*

AESTHETICS

PH302

Prerequisite: Two courses in art and two courses in philosophy. Examination of the work of art – its qualities, its creation, its effect. Three hours a week. Three semester hours.

SOCIAL AND POLITICAL PHILOSOPHY

PH303

Examination of the relations between ethics and politics, the sources and limits of political obligation, the functions of the state, the nature of law, civil disobedience and revolution. Three hours a week. *Three semester hours.*

AMERICAN PHILOSOPHY

PH304

Development of American philosophy through reading and discussion of representative selections. Emphasis is placed on Peirce, James, Royce, Whitehead, Santayana, Dewey. Three hours a week. *Three semester hours.*

PHILOSOPHY OF RELIGION

PH306

Prerequisite: Two courses in philosophy. A philosophical examination of the nature of religious experience, religious arguments, religion and reality, religion and science, religious language, and the changing character of religion in our times. Three hours a week. *Three semester hours.*

EPISTEMOLOGY

PH310

Prerequisite: Two courses in philosophy. This course examines the nature of perception and cognition, the relation of thinking to experience and the nature and limitations of knowledge. Three hours a week. *Three semester hours.*

CONTEMPORARY ETHICAL THEORY

PH312

Prerequisite: Ph 301. An examination of some of the main movements in ethics in the twentieth century including intuitionism, emotivism, prescriptivism, pragmatism and existentialism. Offered every second year. Three hours a week. *Three semester hours.*

KANT

PH320

Prerequisite: Ph 201. A study of Kant's philosophic contributions with special attention to the *Critique of Pure Reason* and other works of Kant. Required for major study. Three hours a week. *Three semester hours.*

GENERAL PHILOSOPHY

PH401

Required of Seniors not completing Ph 101. The aims of this course are to acquaint the student with the philosophic method, the problems and issues of philosophy, and the great philosophers. Three hours a week. *Three semester hours.*

CONTEMPORARY PHILOSOPHY

PH402

Prerequisite: Ph 401 or 101. Required of A.B. and B.S. Degree candidates. This course studies the main lines of modern thought. Special attention will be given to the twentieth century philosophers — the Age of Analysis. Three hours a week. *Three semester hours.*

SEMINAR IN PHILOSOPHY

PH404

Elective for Seniors in A.B. and B.S. non-teaching curriculum completing Ph 401 or 101. One or two selected topics will be treated in depth. Topics will vary from semester to semester. Three hours a week. *Three semester hours.*

HONORS SEMINAR IN PHILOSOPHY

PH490

Required for honors candidates. Second semester Juniors or first semester Seniors. The study area will be determined by the students in consultation with the Department Chairman and faculty member involved in directing the required reading and honors paper. Three hours a week. *Three semester hours.*

PHILOSOPHY OF EDUCATION FOR ELEMENTARY TEACHERS I

PH527

Required for graduate students in elementary program first semester. This course is a historical approach to the study of educational thought and includes an examination of educational ideas which have evolved

through western thought to the present day. Emphasis is on use of this knowledge for elementary teachers. Philosophers and their works are studied in relation to present elementary education. Three hours a week. *Three semester hours.*

PHILOSOPHY OF EDUCATION FOR
ELEMENTARY TEACHERS II

PH528

Required for graduate students in elementary program third quarter. This course studies American and other Twentieth century educators and philosophers and their contributions to American society. Emphasis is on their contributions to elementary education and how elementary teachers may use this knowledge. Four hours a week, third quarter. *Two semester hours.*

PHILOSOPHY OF EDUCATION FOR
SECONDARY TEACHERS I

PH532

Required for graduate students in secondary program first semester. Same as Ph 527 except emphasis is on use of this knowledge for secondary teachers. Philosophers and their works are studied in relation to present secondary education. Three hours a week. *Three semester hours.*

PHILOSOPHY OF EDUCATION FOR
SECONDARY TEACHERS II

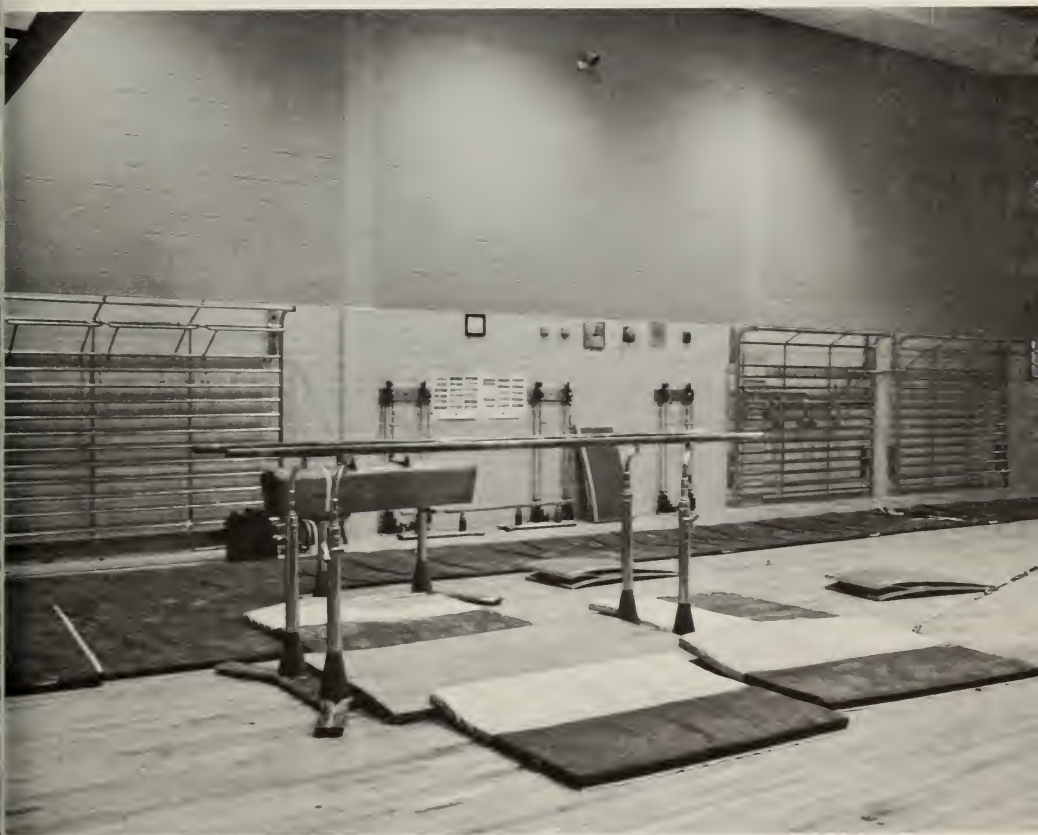
PH532

Required for graduate students in secondary program third quarter. Same as Ph 528 except emphasis is on use of this knowledge of American and other twentieth century educators and philosophers. Emphasis is on their contributions to secondary education and how secondary teachers may use this knowledge. Four hours a week, third quarter. *Two semester hours.*

Physical Education For Men

James P. Sullivan, Chairman

A program of major concentration in physical education is offered,



culminating in a B.S. in Education degree. All Physical Education majors must have the approval of the department chairman.

A minor is granted in Physical Education or Athletic Coaching only upon successful completion of certain specified courses. Course selections must be made with the guidance and approval of the department chairman.

Physical education courses required for the degree are: Physical Education Activities (5 courses) ; First Aid and Training; History and Principles of Physical Education; Anatomy; Physiology; Kinesiology; Elementary Swimming*; Advanced Swimming*; Tests and Measurements; Administration of Health; Physical Education and Athletics; Methods of Physical Education; Physical Education for the Atypical; Curriculum of Physical Education; Coaching Electives (3).

A service program for the non-physical education major is required. It consists of 3 semesters of physical education activity classes and one semester of swimming. This is a degree requirement.

FRESHMAN YEAR ACTIVITIES

PE101-102M

Required of all men students. This course is designed to improve or maintain the physical fitness of the students through vigorous exercise. Emphasis is placed on team games and activities with a "carry-over" value. Instruction is given in softball, tag football, basketball, track, volleyball, badminton, golf, squash, weight training, tumbling, boxing wrestling and gymnastics. Two hours a week. *No credit.*

PHYSICAL EDUCATION ACTIVITIES

PE121-129M

A skills class which will develop the motor ability and knowledge of the student with regard to the various physical education activities and sports. Required of majors for five semesters. *One semester hours per term.*

AQUATICS

PE201M

Required of all Sophomore men. Non-swimmers are taught the elementary strokes. Swimmers' techniques are improved, and their

*The swimming requirement for physical education majors may be waived upon presentation of certain credentials. See the department chairman.

physical condition strengthened. Emphasis is placed on water safety. Exemption of this requirement may be gained by passing a proficiency test. Students taking this test must be registered for the course. Two hours a week. *No credit.*

RECREATION—A MODERN CONCEPT

PE203M

This course is designed to give the student a general overview of the part recreation plays in a modern society. The topics to be covered include an introduction to community recreation, school recreation, national voluntary youth organizations, professional opportunities and recreation program areas. Field work required. Three hours a week. *Three semester hours.*

FIRST AID AND TRAINING

PE211M

Nature and causes of injuries in the field of athletics. The common hazards of play, and preventive measures for athletes from the junior high school level to the college level are discussed. First aid principles, rehabilitation and strapping are presented. *Two semester hours.*

PHYSICAL EDUCATION

PE301M

Required of all Junior men who have elected the Elementary curriculum. This course will include a study of the aims and objectives of physical education at the elementary school level. The students will become acquainted with the methods and materials used in teaching physical education. Two hours a week. *One semester hours.*

HISTORY AND PRINCIPLES OF

PHYSICAL EDUCATION

PE304M

This course covers the history of physical education and recreation from primitive times to the present, incorporating the culture of the world societies. Also examines the implications of the leading philosophies of education for the field of physical education. *Three semester hours.*

PHYSIOLOGY OF EXERCISE

PE311M

This course will deal primarily with man's organic structure and its function during muscular activity. This course will include a laboratory period. *Three semester hours.*

KINESIOLOGY

PE312M

This course will deal primarily with body movement in terms of leverage and proprioception. *Three semester hours.*

METHODS OF TEACHING PHYSICAL EDUCATION

ED336PE

A study of appropriate activities for elementary, junior and senior high school students. Also included will be instruction in the proper methods of organizing and conducting the physical education program. *Three semester hours.*

PSYCHOLOGY OF COACHING

PE314M

This course will provide the student with a knowledge of proven coaching methods and acquaint him with the problems to be expected in the handling of large groups in a competitive environment. *Two semester hours.*

ELEMENTARY SWIMMING

PE321M

The course is concerned with elementary swimming and diving skills. *One semester hour.*

ADVANCED SWIMMING

PE322M

Designed for advanced swimmers. Life-saving techniques will be stressed as well as methods of teaching swimming. Safe boating will be included. *One semester hour.*

CURRICULUM FOR PHYSICAL EDUCATION

PE334M

A study of appropriate activities for elementary, junior, and senior high school students. Also included will be instruction in the proper methods of organizing and conducting the physical education program. *Two semester hours.*

ANATOMY

PE410M

Prerequisite: Bi 201. This course is designed to give the student a thorough knowledge of human anatomy through a study of body systems. Two lectures, two hours in laboratory a week. *Three semester hours.*

COACHING BASKETBALL

PE411M

Organization and administration of a basketball program. Included will be theory and practice in the fundamentals of individual offense and defense. The various styles of team offense and defense and rules of the game will be studied as well as problems in handling and conditioning a team. Field work required. Two lectures, two hours in laboratory a week. *Three semester hours.*

COACHING TRACK AND FIELD

PE412M

A basic and practical course in the development and coaching of Track and Field events at the junior and senior high school level, utilizing the Physical Education classes and inter-class meets. Emphasis will be placed on techniques involved in the following: Sprint, Middle Distance, Distance and Relay as well as the jumping, throwing and weight events. Field work required. Two lectures, two hours in laboratory a week. *Three semester hours.*

COACHING FOOTBALL

PE413M

Analysis of various offensive and defensive systems of play. Organizational schedule for football season and the rest of the year. The rules, theory, strategy, generalship of team play, coaching methods, physical conditioning, scouting reports, games plans, game films and game rules will be analyzed. Instruction in team and individual offensive and defensive fundamentals. Field work required. Two lectures, two hours in laboratory a week. *Three semester hours.*

COACHING WRESTLING

PE414M

The rules, theory, strategy of the individual and of the team and individual skills will be emphasized. Training methods and use of audio-visual equipment will be covered. Field work required. Two lectures, two hours in laboratory a week. *Three semester hours.*

PHYSICAL EDUCATION FOR THE ATYPICAL

PE421M

This course studies various physical disabilities and their implications for physical education. The course is designed to prepare students to work with handicapped youngsters within special and regular programs of physical education. Three hours a week. *Three semester hours.*



TESTS AND MEASUREMENTS FOR
PHYSICAL EDUCATION

PE431M

A practical course in the use of physical education measurement. Includes the study of strength, motor fitness, sports skills, cardiovascular, nutrition, somatotype, body mechanics, and general motor ability tests. Three hours a week. *Three semester hours.*

HEALTH SCIENCE

HL102M

This course emphasizes knowledge of the physiology of the body. Stress is placed on scientific information and the development of health practices which contribute to effective living. *Three semester hours.*

Physical Education for Women

Marie I. Farrell, Chairman

Department offerings are in the disciplines of HEALTH, PHYSICAL EDUCATION and RECREATION.

In addition to the courses designed to meet the college curriculum requirement the department offers both a Major in Physical Education for the Secondary level and the opportunity to Minor in Health, Physical Education and Recreation.

Candidates for the major in Physical Education may earn either a B.A. or a B.S. degree with a minor in Secondary Education. The following courses are required for the major: Pe 107, Pe 108, Pe 207, Pe 208, Pe 304, Pe 307, Pe 308, Pe 312, Pe 407, Pe 409, Pe 411, Pe 412, Hl 102, Hl 103, Bi 211, Bi311.

Students wishing to minor in Physical Education must take 18 hours of work in the field including Pe 304W, Hl 102, Fa 302W, Pe 107-207 or Pe 108-208.

It is recommended that all minors elect Bi 211, Bi 201-202, and Bi 311.

The general College requirement consists of four semesters of Physical Education. One semester of the four required must be Aquatics.

Semester requirements in Physical Education may be met by participation in regular Physical Education classes, in Varsity or Intramural or club activities offered by the Department. No course in Physical Education may be repeated, but, an advanced course in the same activity may be elected. A student may be excused from an activity by passing a proficiency test offered by the Department.

PHYSICAL EDUCATION ACTIVITIES

PE101W

Three semesters of Physical Education are required of all students. A wide variety of dance activities and individual and team sports offerings permit a wide selection of choice. Two hours a week. *No credit*. Degree requirement.

AQUATICS

PE102W

One semester of Aquatics is required of all students in addition to PE 101W. A student who demonstrates proficiency in the Aquatics test administered by the department may be excused from this semester of activity. One hour a week. *No credit*. Degree requirement.

PHYSICAL EDUCATION SKILL DEVELOPMENT I

PE107W

Field sports, stunts and tumbling, basketball I, and gymnastics and apparatus I. Four hours a week. *One semester hour*.

PHYSICAL EDUCATION SKILL DEVELOPMENT II

PE108W

Modern dance I, badminton, softball, track and field. Four hours a week. *One semester hour*.

RECREATION AND LEADERSHIP

PE203W

Course to acquaint prospective community recreation leaders, camp counselors and playground leaders with the need for and the values of recreation in our society. Three hours a week. *Three semester hours*.

ORGANIZATION AND ADMINISTRATION OF

COMMUNITY RECREATION

PE204W

Prerequisite: Pe 203W. The historical, philosophical and theoretical background of recreation, play and leisure through classroom lectures,

planning of community recreation programs and leadership experiences. Three hours a week. *Three semester hours.*

PHYSICAL EDUCATION AND RECREATION
FOR THE MENTALLY RETARDED I

PE205

The characteristics, potentials and limitations of the mentally retarded in physical education and recreation. The student is provided with an understanding of the philosophy, objectives, and guiding principles in programming for the mentally retarded. Three hours a week. *Three semester hours.*

PHYSICAL EDUCATION AND RECREATION
FOR THE MENTALLY RETARDED II

PE206

Prerequisite: Pe 205. Practicum and Seminar. An in-depth study of the problems of the mentally retarded child as he is influenced by physical education and recreational activities. Two class hours a week and 30 hours of field work. *Three semester hours.*

PHYSICAL EDUCATION SKILL DEVELOPMENT III

PE207W

Field hockey, tennis, basketball II, gymnastics and apparatus II. Four hours a week. *One semester hour.* Not to be offered in 1970-1971.

PHYSICAL EDUCATION SKILL DEVELOPMENT IV

PE208W

Modern dance II, golf, volleyball, archery, fencing, aquatics I. Four hours a week. *One semester hour.* Not to be offered in 1970-1971.

PHYSICAL EDUCATION FOR THE
ELEMENTARY SCHOOL

PE301W

Required of Junior women in Kindergarten and Elementary curriculum. Emphasis is on the current materials and techniques used for the teaching of Physical Education in Kindergarten through Grade 6. Recommend any minor elect this course if it is not required by her curriculum. Two hours a week. *One semester hour.*

HISTORY AND PRINCIPLES OF
PHYSICAL EDUCATION

PE304W

The development of Physical Education with particular emphasis on the

major philosophies of general and Physical Education. Implications for the future of the field based upon its biological, sociological and psychological aspects. Three hours a week. *Three semester hours*. Not to be offered in 1970-1971.

CURRENT PROBLEMS IN HEALTH AND
PHYSICAL EDUCATION

PE306W

A topical approach to today's problems in health and physical education through the use of current literature. Elective for women. Three hours a week. *Three semester hours*.

COACHING AND TEACHING PROCEDURES I

PE307W

Course emphasizes the coaching and teaching of selected team sports. Four hours a week. *Two semester hours*. Not to be offered in 1970-1971.

COACHING AND TEACHING PROCEDURES II

PE308W

Course emphasizes the coaching and teaching of selected individual sports. Four hours a week. *Two semester hours*. Not to be offered in 1970-1971.

KINESIOLOGY

PE312W

This course will deal primarily with body movement in terms of leverage and proprioception. Four hours a week. *Three semester hours*. Not to be offered in 1970-1971.

COACHING TEAM SPORTS

PE401W

The philosophy, standards, techniques, and strategy of coaching competitive girls', and women's teams in basketball, softball, volleyball, field hockey, soccer and speedball. Elective for women. Three hours a week. *Three semester hours*.

OFFICIATING WOMEN'S SPORTS

PE402W

The ethics, knowledge and techniques of officiating girls' and women's sports are stressed. The sports included are basketball, volleyball, softball, field hockey and track and field. Elective for women. Three hours a week. *Three semester hours*.

WORKSHOP IN OUTDOOR EDUCATION PE403W

An interdisciplinary approach to the understanding of the inter-relationships that exist between the natural environment and man is provided through classroom lectures, field trips and a four day outdoor education experience at a campsite. Elective for women. *Five semester hours.*

COACHING AND TEACHING PROCEDURES III PE407W

Methods of teaching dance and evaluation techniques in Physical Education. Four hours a week. *Two semester hours.* Not to be offered in 1970-1971.

SEMINAR IN PHYSICAL EDUCATION PE409W

This course includes discussions of the problems in the field, the interpretation and implication of recent research findings and incidents experienced in the practice teaching situation. Two hours a week. *Two semester hours.* Not to be offered in 1970-1971.

ADMINISTRATION OF HEALTH, PHYSICAL
EDUCATION, AND ATHLETICS PE411W

Problems, policies, and principles of operating school programs in regard to participants, professional leadership, scheduling, facilities, equipment and coordination of the programs so that educational objectives are met. Three hours a week. *Three semester hours.*

PHYSICAL EDUCATION FOR THE ATYPICAL PE412W

To bring about an awareness of the physical, mental and emotional problems of the school aged child. An opportunity will be provided to plan and conduct physical education programs for these atypical students in both the regular and adaptive curricula. Three hours a week. *Three semester hours.*

HEALTH SCIENCE HI102W

Scientific information and development of health practices contributing to effective living. Current topic areas dealing with narcotics, alcohol and diseases are stressed. Elective for women. Three hours a week. *Three semester hours.*

HEALTH PROBLEMS IN THE CLASSROOM

HI103W

Health problems occurring in school-age children which adversely affect learning will be presented. Emphasis will be placed upon the role of the teacher in recognizing and dealing with these problems. Elective for women. Three hours a week. *Three semester hours.*

FIRST AID

FA302W

Required for Junior women in Education Curricula. This course fulfills the requirements of the Standard and Advanced Red Cross First Aid Courses. Two hours a week. *One semester hour.*

Physics

Dr. Francis W. McCarthy, Chairman

The department offers majors in Physics and the Natural Sciences. A.B. and B.S. majors in Physics are required to take the following courses: P 101-102; P 201-202; P 204; P 401-402; P 407-408; and P 409-410. They must complete courses in Mathematics through Mathematical Physics and Chemistry 101-102. Candidates for A.B. (with teacher preparation) and B.S. in Education majors in Natural Science are required to take Ch 101-102; P 101-102; or P 301-302; P 306; Gl 101; Bi 201-202 and P 406. A minor in Physics may be obtained by taking P 101-102; P 201 and two courses from the Advanced Physics list. A minor in Natural Sciences may be obtained by taking Ch 101-102; P 101-102 or P 301-302; and Bi 201-202.

For those students interested in teaching Physics, programs can be arranged with the department chairman.

PHYSICAL SCIENCE I

PS101

An introductory course for non-science majors, in which selected topics in physics are considered. Three hours a week. *Three semester hours.*

PHYSICAL SCIENCE II

PS102

An introductory course for non-science majors in which selected topics in chemistry are considered. Three hours a week. *Three semester hours.*

NATURAL SCIENCE I PS103

An introductory course for non-science majors in which selected topics in physics and astronomy are considered. The emphasis is on the inquiry approach with selected activities to illustrate the methodology of science. Three hours a week. *Three semester hours.*

NATURAL SCIENCE II PS104

An introductory course for non-science majors in which selected topics in chemistry are considered. The same rationale is employed as in Ps 103. Three hours a week. *Three semester hours.*

COLLEGE PHYSICS—MECHANICS P101

Prerequisite: M 103 (May be taken concurrently). An intensive study is made of the kinematics and dynamics of point masses and rigid bodies. Three lectures, two hours in laboratory a week. *Four semester hours.*

COLLEGE PHYSICS II P102

Required of all physics majors. Prerequisite: M 107. (May be taken concurrently). A study of electricity and magnetism will be made. Three lectures, two hours in laboratory a week. *Four semester hours.*

COLLEGE PHYSICS III P201

Prerequisite: P 102. Introduction to modern (non-classical) physics and relativity with emphasis on atomic theory. Three lectures, one hour in laboratory a week. *Four semester hours.*

ELECTROMAGNETIC THEORY P202

Prerequisites: P 101, 102; M 107, 108 or permission of instructor. Maxwell's equations will be developed and the mathematics of waves will be discussed. Three hours a week. *Three semester hours.*

STATISTICAL PHYSICS P204

This course attempts to connect microscopic properties of particles, governed by atomic physics, to the macroscopic behavior of physical systems using a statistical approach. Students should be familiar with classical mechanics and with the ideas of atomic physics. Four hours a week. *Four semester hours.*

GENERAL COLLEGE PHYSICS I

P301

An introduction to kinematics and dynamics. The material is presented without the use of calculus and is intended for those not majoring in physics. Two lectures, two hours in laboratory a week. *Three semester hours.*

GENERAL COLLEGE PHYSICS II

P302

Continuation of P301. Course presents fundamentals of electromagnetic theory and elementary atomic physics. Two lectures, two hours in laboratory a week. *Three semester hours.*

ASTRONOMY

P306

Prerequisite: one year of college mathematics. A study of the major features of the solar system, and an introduction to stellar astronomy. Required of all students majoring in Natural Sciences, and an elective of all other science majors and mathematics. Three hours a week. *Three semester hours.*

MODERN PHYSICS I

P401

The theory of special relativity. Space, time, four-dimensional model, interaction of atomic particles. Protons. Three hours a week. *Three semester hours.*

MODERN PHYSICS II

P402

The quantum theory. Wave properties of particles. Uncertainty relations. Complementarity. Shroedinger's equations and applications to atoms and molecules. Three hours a week. *Three semester hours.*

ELECTRONICS

P403

Prerequisite: M 207. (May be taken concurrently. Vacuum tube and transistor theory is studied in detail and their application to power supply and amplifier circuits investigated. Three lectures, two hours in laboratory a week. *Four semester hours.*

HISTORY AND PHILOSOPHY OF SCIENCE

P406

Required of all students who are candidates for a major in Natural

Sciences. Elective for those who have taken Ps 101-102 or equivalent. The course traces the development of scientific ideas from antiquity to the present. Three hours a week. *Three semester hours.*

ADVANCED LAB I & II

P407-408

Prerequisites: P 101-102; (P 201 may be taken concurrently). A modern laboratory course designed to acquaint the student with the spirit and methods of experimental research in Physics. Three hours a week. *Three semester hours.*

THEORETICAL PHYSICS I

P409

Prerequisite: M413. Required of all physics majors. Elective for those who have the prerequisites in Mathematics. The dynamics of particles, rigid bodies and elastic media will be examined by Newtonian, LaGrangian and Hamiltonian methods. Three hours a week. *Three semester hours.*

THEORETICAL PHYSICS II

P410

Prerequisite: M 413. In this part of the course Maxwell's equations and electromagnetic theory will be studied. Three hours a week. *Three semester hours.*

HONOR SEMINAR

P490

For students with some background in physics. Supervised study according to the needs and interests of the individual student. Number of meetings varies. *Two semester hours.*

SEMINAR IN SCIENCE

PS503

An involvement seminar in the laboratory and classroom techniques of the "new" science courses, namely PSSC-Physics, ChemStudy - chemistry and ESCP - Earth Science. (Each student has an opportunity to lead the class through a complete laboratory - classroom experience.) Two hours a week, third quarter. *Two semester hours.*

ASTRONOMY

PS531

A course in descriptive astronomy, required of graduate students who

are majoring in the teaching of secondary school science. Three hours a week. *Three semester hours.*

HISTORY AND PHILOSOPHY OF SCIENCE

PS532

Required of graduate students who are majoring in the teaching of science in the secondary school. Four hours a week, third quarter. *Two semester hours.*

Political Science

Dr. David L. Sudhalter, Chairman

A major in Political Science is opened to all interested candidates for the A.B. or B.S. degrees. A B.S. or B.A. in education candidate may major in political science provided he/she minors in history. A major is required to complete the following before graduation: Gv 101, Gv 102, Gv 201, Gv 202, Gv 301, and three (3) other three-hour courses in the field. All major programs should be planned in consultation with the Department Chairman or the Assistant Chairman.

A minor is available for all degree candidates. The minor must include the five required courses listed for a major above, and one other three-hour course in government.

All incoming Freshmen as of the fall of 1969 come under the new departmental standards of the New Curriculum. A major under the New Curriculum is required to complete thirty (30) hours in political science before graduation of which Gv 101, Gv 102, Gv 201, Gv 202, and Gv 301 are required; and the minor must select the five (5) required courses listed for a major and two (2) three-hour courses in government.

The department of Political Science participates in the Honors Program.

AMERICAN GOVERNMENT

GV101

An elective for Freshmen and Sophomores. An analysis of the executive, legislative, and judicial branches of the National Government, with particular attention to the Constitution, federalism,

political parties, and economic and welfare activities. Three hours a week. *Three semester hours.*

COMPARATIVE GOVERNMENT

GV102

An elective for Freshmen and Sophomores. A comparative study of the governments of Great Britain, France, Germany, and the Soviet Union. Three hours a week. *Three semester hours.*

POLITICAL THEORY I

GV201

An elective for Sophomores and Juniors. Covers the major political doctrines held by theorists from Plato to Hobbes. Special attention given to placing each theorist in the proper cultural context. Three hours a week. *Three semester hours.*

POLITICAL THEORY II

GV202

An elective for Sophomores and Juniors. Continuation of Gv 201 emphasizing the political theorists from Hobbes through Lenin, with particular stress on the liberal democrats, the socialists, and totalitarian philosophers. Three hours a week. *Three semester hours.*

POLITICS OF MODERN AFRICA

GV203

An elective for Sophomores, Juniors, and Seniors. A survey of representative African government types, with particular stress on socio-political change, nationalism, duality, nation-building, and Pan-Africanism. Three hours a week. *Three semester hours.*

EDUCATION FOR CITIZENSHIP

Gv204

An elective for Sophomores and Juniors. An examination of the nature of democratic citizenship, and the processes through which one participates in the political culture. Three hours a week. *Three semester hours.*

INTERNATIONAL RELATIONS

GV301

An elective for Juniors and Seniors. An analysis of the tangible and intangible elements of national power, the concepts of national interest and the balance of power, and the foreign policies of selected states.

MASSACHUSETTS GOVERNMENT

GV302

An elective for Juniors and Seniors. A study of state, county, municipal, and town governments in Massachusetts. Three hours a week. *Three semester hours.*

AMERICAN CONSTITUTIONAL PROBLEMS AND LAW

GV303

An elective for Juniors and Seniors. Traces American constitutional development, and stresses the role of the Supreme Court, the separation of powers, federalism, and individual rights. Three hours a week. *Three semester hours.*

POLITICAL PARTIES AND INTEREST GROUPS

GV304

An elective for Juniors and Seniors. The coalition nature of major political parties, their ideology and structure, the role of third parties, political behavior, and pressure groups form the core of this course. Three hours a week. *Three semester hours.*

INTRODUCTION TO LAW

GV305

An elective for Juniors and Seniors. A study of the general principles of statutory and common law. Three hours a week. *Three semester hours.*

COMMERCIAL LAW

GV306

An elective for Juniors and Seniors. An analysis of the elementary organization and functioning of business enterprises. Three hours a week. *Three semester hours.*

INTERNATIONAL ORGANIZATION

GV307

An elective for Juniors and Seniors. The evolution of international organization, the Hague system, the League of Nations, the United Nations, and Supranational groups form the major strand of this course. Three hours a week. *Three semester hours.*

AMERICAN FOREIGN POLICY

GV308

An elective for Juniors and Seniors. A probe designed to give a comprehensive understanding of the conduct of American Foreign

Policy since 1950, with emphasis on economic, diplomatic, and cultural aspects. Three hours a week. *Three semester hours.*

COMMUNIST BEHAVIOR IN WORLD AFFAIRS GV309

An elective for Juniors and Seniors. An overview of relations between selected members of the Socialist world: Asian, Latin American, East and West European, and Near Eastern states. Three hours a week. *Three semester hours.*

URBAN GOVERNMENT GV310

An elective for Juniors and Seniors. An analysis of the politics of minorities in Urban America with stress on urban renewal, suburbia, metropolitan government, pollution, transportation, and the role of the police. Three hours a week. *Three semester hours.*

THE UNITED STATES CONGRESS GV311

An elective for Sophomores, Juniors, and Seniors. To be covered: the mode of election, the seniority system, the committees, the rules and work-load, and differences between the House and Senate. Three hours a week. *Three semester hours.*

THE PRESIDENCY GV312

An elective for Sophomores, Juniors, and Seniors. Central to this course are the President's role, the tremendous powers held, the advisors necessary for decision-making, and the difficulties of achieving the consensus. Three hours a week. *Three semester hours.*

POLITICS OF DEVELOPING AREAS GV313

An elective for Juniors and Seniors. Study of social mobilization and political modernization in selected developing countries of the Near East, Asia, Latin America, and Africa, with special emphasis on political elites, ideologies, and economic development. Three hours a week. *Three semester hours.*

CONTEMPORARY POLITICAL THEORIES GV314

An elective for Juniors and Seniors. An examination of significant

political theories in the Twentieth Century. Particular stress given to problems of political obligation. Three hours a week. *Three semester hours.*

GOVERNMENTS AND POLITICS OF THE FAR EAST GV315

An elective for Juniors and Seniors. Study of government, parties, and ideologies in the selected countries of the Far East. Emphasis on international relations and foreign policies. Three hours a week. *Three semester hours.*

PUBLIC ADMINISTRATION GV316

An elective for Juniors and Seniors. Survey of public administration in the United States. Emphasis on bureaucracy, policy-making administrative power, budgetary process, civil service, and control of administration. Three hours a week. *Three semester hours.*

PUBLIC OPINION AND PROPAGANDA GV317

An elective for Juniors and Seniors. The relationship between public opinion and mass democracy, the news media and public opinion will be analyzed in terms of their political effects, as will democratic and totalitarian propaganda. Three hours a week. *Three semester hours.*

GOVERNMENT AND POLITICS IN THE NEAR EAST GV318

An elective for Juniors and Seniors. Internal developments in Near Eastern countries as well as the tensions between Israel and the Arab states will be scrutinized. The role of the major powers in the area will be probed. Three hours a week. *Three semester hours.*

CIVIL LIBERTIES GV319

An elective for Juniors and Seniors. The basic principles of constitutional liberties in the United States will be linked to recent and current topics. Three hours a week. *Three semester hours.*

SOVIET FOREIGN POLICY GV320

An elective for Juniors and Seniors. Emphasis is on the behavioral trends in Soviet Foreign Policy since 1917, with particular attention to

policy-making, relationships with socialist bloc countries and western and non-aligned nations. Three hours a week. *Three semester hours.*

GOVERNMENT AND POLITICS OF EASTERN EUROPE

GV321

An elective for Juniors and Seniors. Emphasis is on the behavioral characteristics of the Eastern European political systems, including problems of interbloc ideological coordination, economic cooperation, and national communism. Three hours a week. *Three semester hours.*

THE CONTEMPORARY PUERTO RICAN

GV322

An elective for Sophomores, Juniors and Seniors. An in-depth study of Puerto Rican government and politics with a special emphasis on the Puerto Rican's problems as a migrant in the United States. Our study will take into account both his island experiences which he brings to the mainland and the nature of the city ghetto (el barrio) which usually embraces him when he arrives. Three hours a week. *Three semester hours.*

STATE AND LOCAL GOVERNMENT

GV323

An experimental course in city-state power politics in which the students will democratically determine purpose, direction and conduct of the course. The area of student selection will involve bibliography research, seminars, community contacts, papers and guest lecturers. Two hours of lecture and two hours of laboratory and field work a week. *Three semester hours.*

SEMINAR IN SELECTED TOPICS

GV490

Required of all honors' candidates during the second semester of the Junior year. Opened to others with permission of the Department Chairman. This course deals with the writing of special papers and research methods. Three hours a week. *Three semester hours.*

Psychology

Dr. J. Edward Conners, Chairman

The psychology department offers a program of study leading to the A.B. (non-teaching) or B.S. (non-teaching) degrees in psychology as well as course work required for degrees in education.

The psychology major is first of all a scientist—a scientist interested in behavior. The department therefore believes that its psychology majors should receive a thorough preparation and education in the fundamentals of the scientific method and experimental design and analysis. The program in psychology consists of 24 credit hours which must include all of the following courses: Py 101, Py 103, Py 203, and either Py 410, 470 or 490. It is also strongly recommended that Psychology majors take Py 104. These required courses must be taken in the sequential order indicated since each course in the series builds upon the preceding courses. Two or more required courses cannot be taken concurrently. Students should familiarize themselves with the program so that scheduling conflicts will be avoided.

All Psychology Majors are required to register as such with the psychology department in order that an advisor may be assigned to help the student plan his program of study.

A Psychology Minor is comprised of 18 credit hours of which only Py 101 is required.

Satisfactory completion of Py 101 is a prerequisite for all advanced courses.

INTRODUCTION TO PSYCHOLOGY

PY101

Required of all Freshmen in the teacher preparation curricula, elective for others. The course covers the fundamentals of the scientific study of behavior. Three hours a week. *Three semester hours.*

INTRODUCTION TO STATISTICS

PY103

This fundamental course prepares the student to read the research literature in the social sciences, to undertake courses in experimental psychology, and to advance to more sophisticated courses in statistics.

May be taken concurrently with Py 104. Three hours a week. *Three semester hours.*

ADVANCED GENERAL PSYCHOLOGY

PY104

To give the student a more sophisticated understanding of himself and his society through reading and guided experience in the experimental analysis of the behavior of organisms. Required of all psychology majors, effective the class of 1972. Admission by consent of the instructor. Two lectures, two hours in laboratory a week. *Three semester hours.*

CHILD PSYCHOLOGY

PY201

Required of sophomores who plan to elect the Elementary or Kindergarten-Primary Curriculum. The course presents a systematic, intergrative, description of the psychological development of children from birth through adolescence. Three hours a week. *Three semester hours.*

GENERAL EXPERIMENTAL PSYCHOLOGY

PY203

Prerequisites: Py 101, Py 103, Py 104. Required of all psychology majors. An introduction to experimental methodology in the scientific investigation of behavior. Two lectures, two hours in laboratory a week. *Three semester hours.*

ADOLESCENT PSYCHOLOGY

PY231

Required of Sophomores who plan to elect the Secondary curriculum. This course focuses on the developmental tasks of adolescence, the transitional period from puberty to adulthood. Three hours a week. *Three semester hours.*

SOCIAL PSYCHOLOGY

PY301

An introduction to the study of behavior of the individuals in groups and his interaction with those groups. Under consideration will be such topics as attitudes, language, group interaction, and role theory. Three hours a week. *Three semester hours.*

PHYSIOLOGICAL PSYCHOLOGY

PY302

Prerequisites: Py 101, Py 104. The study of the nervous system, the brain, sensory processes, and various physiological states, and how all of these relate to behavior. Three hours a week. *Three semester hours.*

COGNITIVE DEVELOPMENT

PY303

An examination of the development of intelligence in the child. Particular emphasis will be placed on the theories of Jean Piaget and related research. By permission of the instructor only. Three hours a week. *Three semester hours.*

PSYCHOLOGY OF LEARNING

PY304

Prerequisites: Py 101, Py 104. A fairly intensive study of the principles of learning including classical and instrumental conditioning, reinforcement, extinction, discrimination, verbal learning, etc. Two lectures, two hours in laboratory a week. *Three semester hours.*

PSYCHOLOGY OF CREATIVITY

PY305

A review of current research in the general area of creativity. Emphasis on experimental investigation and empirical findings. Recommended for psychology majors and education majors. Three hours a week. *Three semester hours.*

EDUCATIONAL PSYCHOLOGY

PY 310

A study of psychological facts and principles fundamental to education, teaching, and personal relationships between teacher and learner. Learning and the various factors affecting classroom behavior will be discussed. Three hours a week. *Three semester hours.*

PSYCHOLOGY OF EXCEPTIONAL CHILDREN

PY312

Prerequisites: Py 101, Py 201, Py 310. Elective for Juniors and Seniors. This course covers the characteristics, problems, and educational provisions for the mentally retarded (both trainable and educable), brain damaged, gifted, deaf, hard of hearing, blind, partially sighted, and those with speech defects. Three hours a week. *Three semester hours.*

PSYCHODYNAMICS OF INTERRACIAL GROUPS

PY333

Prerequisite: Py 101. An intensive group experience is provided for a racially mixed group of students. Non-verbal techniques are used to increase self-understanding, to explore the emotional impact of prejudice as revealed in the personal interactions of group members, and to structure the experiences of participants within the group in terms of relevant psychological constructs. Admission by consent of the instructor. Two 1½ hour lectures a week. *Three semester hours.*

THEORIES OF PERSONALITY

PY401

Prerequisites: Py 101 and six hours of additional study in Psychology. This course is designed to acquaint the advanced student with the major psychological theories explaining the structure and dynamics of the human personality. Three hours a week. *Three semester hours.*

ABNORMAL PSYCHOLOGY

PY403

Prerequisites: Py 101 and six hours of additional study in Psychology. This course is concerned with the development of concepts and principles of unusual mental activity with special emphasis placed upon the relation of those principles and concepts to general, child, and adult psychology. Recommended for psychology majors and education majors. Three hours a week. *Three semester hours.*

PSYCHOLOGICAL MEASUREMENTS

PY405

This course includes the historical background of psychological testing. It also covers elementary statistical concepts, test standardization, the 1960 Stanford-Binet and Wechsler scales, tests of aptitude, achievement, personality, attitudes, and projective methods. Three hours a week. *Three semester hours.*

HISTORY OF PSYCHOLOGY

PY407

Prerequisites: Py 101, Py 104. A study of the historical developments within the science of psychology from the early Greek period to the present day. Three hours a week. *Three semester hours.*

PSYCHOLOGICAL RESEARCH SEMINAR

PY410

Prerequisites: Py 101, Py 103, Py 104, Py 203 and six additional hours of study in Psychology. Only seniors are eligible. This seminar offers a program of directed study in the formulation of a research problem, the design of an experiment, the analysis of data, the interpretation of data, and the writing of a report which adequately communicates these procedures. Required of all candidates for the major in Psychology except Honors candidates (who should elect Py 490) or students who elect Py 470 (Practicum). Three hours a week. *Three semester hours.*

PRACTICUM IN PSYCHOLOGY

PY470

Prerequisites: Py 101, Py 103, Py 104, Py 203, and six additional hours of study in Psychology. Only seniors are eligible. This course is designed to provide the advanced student with an opportunity to obtain practical experience in a field situation. Students are required to write a comprehensive evaluation and report of their experience. Placements must be arranged through and approved by the Psychology Department. Work hours to be arranged. *Three semester hours.*

PSYCHOLOGY HONORS

PY490

Prerequisites: Py 103, Py 104, Py 203, and approval of the candidate's application by the Honors committee. Elected in the final semester of the senior year in place of Py 410. (Research Seminar) or Py 470 (Practicum). Open only to outstanding psychology majors who display not only the minimal grade-point average of 3.0 or above (accumulative for all courses taken in college), but also the ability, initiative, and persistence necessary to do independent research. Class meets once a month in informal sessions to discuss research ideas, thesis proposals, and data analysis. Students must write an Honors thesis of acceptable quality (grade of A or B) based on original research in order to graduate with Honors. *Three semester hours.*

PSYCHOLOGY OF EDUCATION FOR SECONDARY TEACHERS

PY501

The course content includes schools of psychology, principles of growth and development, how the learner learns, creates and solves

problems, mental hygiene in the classroom, leadership and group dynamics. Research project is required of every student. Three hours a week, first semester. *Three semester hours.*

PSYCHOLOGY FOR TEACHERS (ELEMENTARY SCHOOL)

PY522

The major thrust of the course is to understand how the child sees himself and how he interprets the world about him. In order to have living proof of the theories and principles, every student is required to do a case study of a child. Three hours a week, first semester *Three semester hours.*

Sociology and Anthropology

Dr. Lauréat J. Bernard, Chairman

Sociology as a major is open to all B.S. and B.A. candidates. Majors in Sociology must complete So 201, So 202, So 204, So 402, and four (4) three-hour classes in the concentration before graduation.

A minor in Sociology is available for all degree candidates, and a minor in Anthropology is also offered for all interested students. The minors in either fields must include the following three (3) courses in their eighteen (18) hours: So 201, So 202, and So 204. Naturally, a minor in Sociology would take the core of his nine (9) elective hours in Sociology, while one in Anthropology would concentrate in that field.

All students admitted since the fall of 1969, come under the revised standards established under the New Curriculum. All Sociology majors matriculating for the B.S. or B.A. under this category must complete So 201, So 202, So 204, and twenty-one (21) more hours in Sociology/Anthropology before graduation. A minor in Sociology or Anthropology is available for all degree candidates. Minors in either Sociology or Anthropology must complete the three (3) fundamental courses required of the majors, plus twelve (12) elective hours in their chosen field. So 402 is recommended as an elective for both majors and minors.

INTRODUCTION TO SOCIOLOGY

SO201

An elective for Freshmen, Sophomores, and Juniors. An introduction to the field of Sociology. A survey of concepts: socialization; primary groups; social stratification, population, ecology and social change in American society, and the application of these concepts to basic institutions: the family, education and religion. A prerequisite to advanced courses in Sociology. Three hours a week. *Three semester hours.*

SOCIOLOGICAL THEORY

SO202

An elective for Sophomores, Juniors, and Seniors. Sociological theory from the 18th century on, emphasizing such European theorists as Durkheim, Spencer, Weber and Marx; and American theorists: Veblen, Mannheim, Cooley, Merton, and Parsons. Three hours a week. *Three semester hours.*

SOCIAL STRATIFICATION

SO203

An elective for Sophomores, Juniors, and Seniors. An examination of theories and research in social stratification. Emphasis on current class groupings, social mobility and occupational structures. Three hours a week. *Three semester hours.*

SOCIOLOGICAL METHODOLOGY

SO204

An elective for Sophomores, Juniors, and Seniors. An intensive study of research design, data collection and analysis, and related topics in social research. Three hours a week. *Three semester hours.*

PHYSICAL ANTHROPOLOGY

AN205

An elective for Sophomores, Juniors, and Seniors. An introduction to the field. Subject matter includes primate and human anatomy; fossil man and his evolution; and problems of racial classification and racism. Three hours a week. *Three semester hours.*

SOCIAL WELFARE

SO206

An elective for Freshmen, Sophomores, and Juniors. The development of social welfare as an institution with an emphasis on its relationship

to changing technology, possible solutions to poverty, and the emergence of social work as a profession. Three hours a week. *Three semester hours.*

CULTURAL ANTHROPOLOGY

AN301

An elective for Sophomores, Juniors, and Seniors. The student is introduced to such topics as: The nature and content of culture; culture in time; aspects of culture including the family, kin, religion; cultural values and culture change. Three hours a week. *Three semester hours.*

CRIMINOLOGY

SO302

An elective for Juniors and Seniors. The sociological study of crime and criminals — an examination of crime rates, theories of criminal behavior systems, and the correction system. Three hours a week. *Three semester hours.*

RACE RELATIONS

SO303

An elective for Sophomores, Juniors, and Seniors. A survey of the definitions and concepts essential for a study of human relations involved within and between racial groups. Emphases are placed on the current American black/white racial problems with implications analyzed for minority groups in America other than the black population. Three hours a week. *Three semester hours.*

CULTURE AND PERSONALITY

SO304

An elective for Sophomores, Juniors, and Seniors. The impact of a society's culture upon the personality of its members. Three hours a week. *Three semester hours.*

THE FAMILY

SO/AN305

An elective for Juniors and Seniors. The nature, historical development and functions of the family in various cultures, with specific emphasis upon the American family. Three hours a week. *Three semester hours.*

THE COMMUNITY

SO306

An elective for Juniors and Seniors. The community in America. The

development and trends of modern communities; ecology, social processes, the institutions and social structure of urban, suburban, rural and metropolitan regions, Community planning and urban redevelopment. Three hours a week. *Three semester hours.*

URBAN SOCIOLOGY SO307

An elective for Juniors and Seniors. An examination of the city, past and present; urban living, demographic and survey data applied to the city; and urban problems. Three hours a week. *Three semester hours.*

SOCIOLOGY OF EDUCATION SO308

An elective for Juniors and Seniors. Education viewed as a social force with probes into the social organization of the school, school-community relationships and the varied population groups schools serve with special emphasis on urban school problems. Three hours a week. *Three semester hours.*

SOCIOLOGY OF OCCUPATIONS AND PROFESSIONS SO309

An elective for Sophomores, Juniors, and Seniors. The historical meaning and function of work in an industrial society. The analysis of the labor force concept, of specialization, and professionalization. Three hours a week. *Three semester hours.*

SOCIOLOGY OF BUREAUCRATIC ORGANIZATIONS SO310

An elective for Sophomores, Juniors, and Seniors. Theories of bureaucracy as they apply to such formal organizations as the government, the economy, religion, the military, and education. Three hours a week. *Three semester hours.*

POLITICAL SOCIOLOGY SO311

An elective for Juniors and Seniors. The study of political behavior; the impact of social forces on voting behavior; an analysis of pressure groups, and responses to blocking of legitimate political channels. Three hours a week. *Three semester hours.*

MEDICAL SOCIOLOGY SO312

An elective for Juniors and Seniors. Man's social activities — economic,

residential, familial — in relation to his health. Medical personnel and patients. The role of the sick. Medical theories as practiced in different societies. Hospitals as social organizations. Three hours a week. *Three semester hours.*

JUVENILE DELINQUENCY SO313

An elective for Juniors and Seniors. The sociological study of the juvenile offender. The distribution in the population; theories of gang behavior; motivations for individual delinquent behavior, and rehabilitation techniques. Three hours a week. *Three semester hours.*

ANTHROPOLOGICAL THEORY AN314

An elective for Sophomores, Juniors, and Seniors. Anthropological theorists and the impact of their theories on modern anthropological thought including: evolution, historical reconstruction and diffusion; functionalism, and structuralism. The function of theory. Three hours a week. *Three semester hours.*

RESEARCH METHODS IN ANTHROPOLOGY AN315

An elective for Sophomores, Juniors, and Seniors. A survey of research methods in the fields of ethnology, ethnography, physical anthropology, archaeology, and linguistics. Three hours a week. *Three semester hours.*

APPLIED ANTHROPOLOGY AN316

An elective for Sophomores, Juniors, and Seniors. The application of anthropological techniques as they relate to problems of culture change, with particular focus upon the impact of change on the peoples and cultures of developing countries. Three hours a week. *Three semester hours.*

PREHISTORIC ARCHAEOLOGY AN317

An elective for Sophomores, Juniors, and Seniors. A review of the cultures of prehistoric man in Europe, Asia, Africa, and the Americas. Emphasis is placed upon the development of cultures through time. Three hours a week. *Three semester hours.*

SOCIAL MOVEMENTS

SO318

An elective for Sophomores, Juniors, and Seniors. The analysis of selected social movements. Emphasis on such present movements as Hippies, and such classical movements as the Ghost Dancers of the Great Plains. Three hours a week. *Three semester hours.*

COMPARATIVE SOCIAL STRUCTURES

AN319

An elective for Sophomores, Juniors, and Seniors. A comparison of social structures of selected non-western societies. Stress is placed upon the meanings of society, structures and systems, and methods of comparison. Three hours a week. *Three semester hours.*

THE CULTURES OF BLACK AFRICA

AN322

An elective for Juniors and Seniors. African geography, prehistory and cultures; the spectrum of cultures ranging from the pygmy to the Ashanti Federation; the family, lineage, clan and tribe as these relate to problems of political and economic change in contemporary Africa. Three hours a week. *Three semester hours.*

SOCIAL CHANGE

SO323

An elective for Sophomores, Juniors, and Seniors. Analysis of the processes of change in society and specific theories of change. Innovation, resistance to change, and ideological and technological factors will be examined. Three hours a week. *Three semester hours.*

SOCIAL INTERACTION

SO401

An elective for Seniors — majors in sociology. The course is designed to give the student experience in using sociological concepts to increase his understanding of social interaction in small-group situations. Three hours a week. *Three semester hours.*

SOCIAL PROBLEMS

SO402

An elective for Juniors and Seniors. Five major social problems are examined: mental illness, delinquency, criminology, drug addiction, and poverty. Three hours a week. *Three semester hours.*

SOCIOLOGY OF ATTITUDES AND EMOTIONS

SO405

An elective for Juniors and Seniors. The social development of ethics, ideology, beliefs, concepts of legitimacy and the emotions that are expressed in social situations. Three hours a week. *Three semester hours.*

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